THE ARCHITECT & BUILDING NEWS

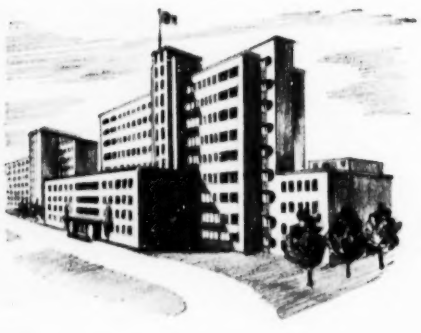
IN THIS ISSUE

- PUBLIC HOUSE AT ADEYFIELD
- E.D.A. TESTING HOUSE, LEATHERHEAD
- CURRENT MARKET PRICES

JULY 23, 1953 · VOL. 204 · NO. 4 · ONE SHILLING WEEKLY

The BRITANNIC *Floor Spring*

No 444



Makers of Floor Springs in 10 Reigns

WILLIAM NEWMAN & SONS Ltd.

HOSPITAL STREET, BIRMINGHAM 19. *Established over 200 years*

"I drives out to Elmer's place; I knocks a couple of times on the door and I see they got a lot of folks to dinner, so not wishin' to disturb them, I just sneaks around to the side door and yells, "Hey, Elmer here I am: where do you want the privy put?"

*Lemuel Putt**

THAT'S not quite the technique of the Williams & Williams sales representative, so far as we know. Ask him about the new all-steel Roften privies.† They really are worth considering as the following reasons will show:—

1. Roften toilet compartments are cheaper than brick and tiles: prefabrication makes them easy and quick to erect.

2. They can be grouped in any number.

3. They are made of high quality sheet steel which is rustproof, fire resistant and won't harbour germs.

4. The doors are double skinned to prevent warping.

5. They will stand up to climatic conditions in any part of the world.

6. The clean straight lines are in keeping with modern trends in design.

7. Roftens are supplied in finished colours to specification.

If you are putting toilet compartments into schools or hospitals, factories or offices we should be glad to tell you about the new Roften lavatory units. Please write or telephone.

† ***Lavatories or even toilet compartments if you wish Sir.***

* *The Specialist by Charles Sale : Putnam, 42 Great Russell Street, London, W.C.2.*

The Pressed Metal Division of WILLIAMS & WILLIAMS Limited

ROFTEN WORKS HOOTON CHESHIRE

London Office: Victoria House, Southampton Row, W.C.1. Telephone: HOLborn 9861-5

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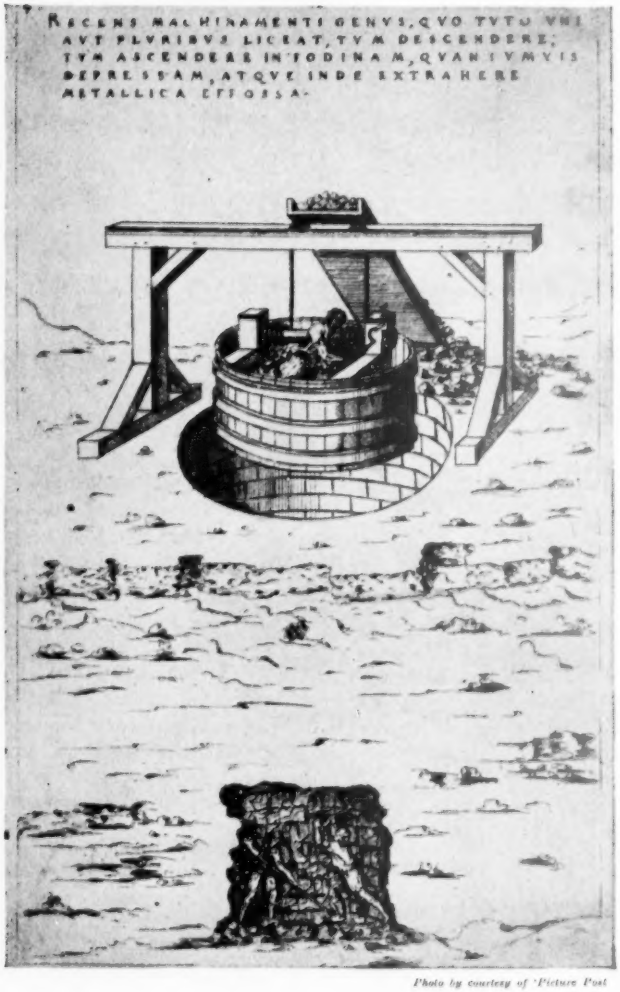
RECENS MACHINAMENTI GENVS, QVO TVTO VNI
AVT PLVRIBVS LICEAT, TVM DESCENDERE;
TVM ASCENDERE IN FODINAM, QVANTVMVIS
DEPRESSAM, ATQVE INDE EXTRAHERE
METALLICA EFFOSSA.

A design for a lift to carry both personnel and materials. Construction of the lift shaft is most substantial, but the hoisting mechanism is perhaps a trifle sketchy.

By Jacques Besson, French mathematician and scientist, 1659.

Photo by courtesy of 'Picture Post

for the most modern interpretation of vertical transport

Lifts and Escalators

by

J. & E. HALL
LIMITED

LIFT AND REFRIGERATING ENGINEERS DARTFORD KENT

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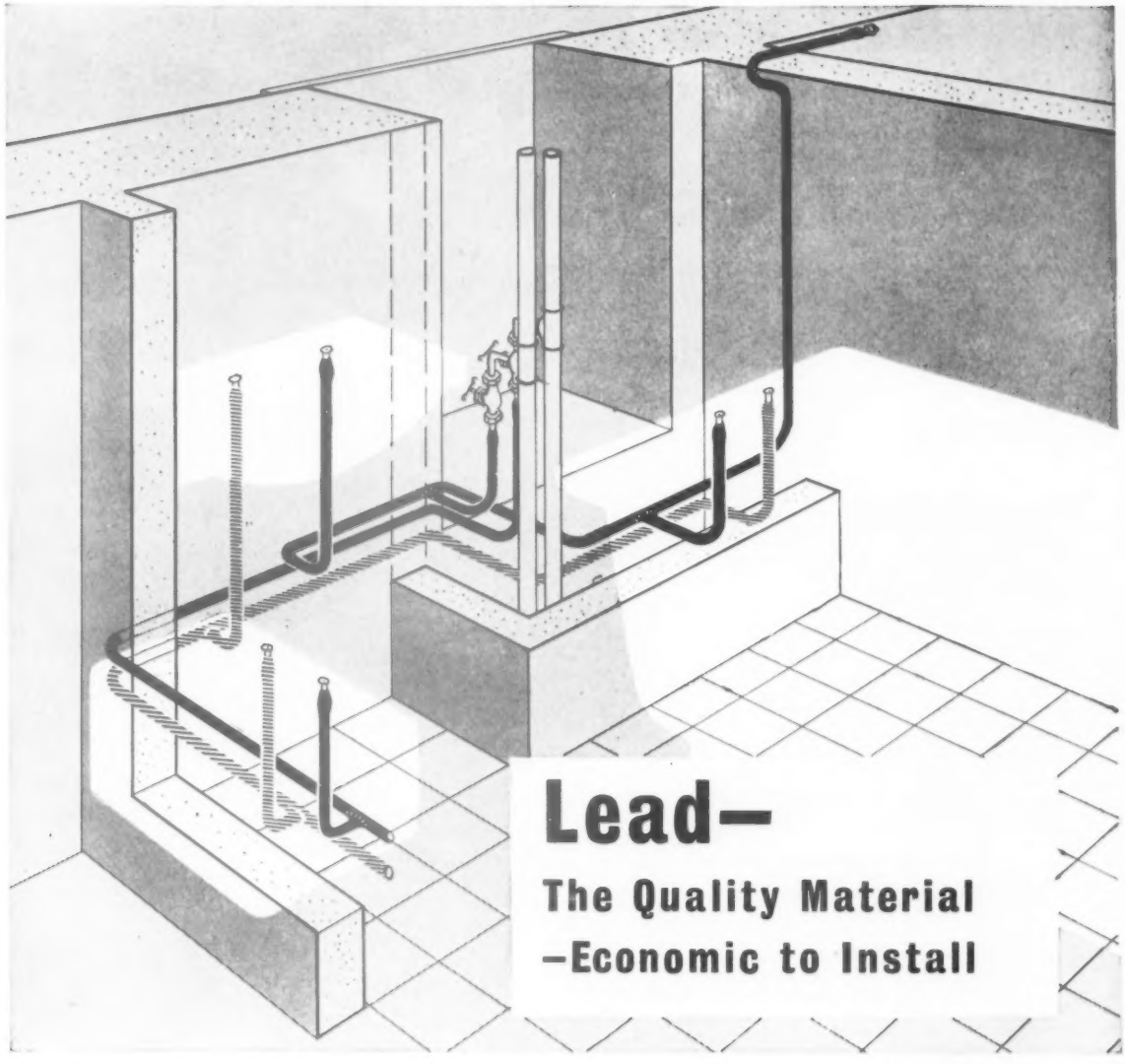


Lead—

The Quality Material —Economic to Install

h

LEAD LASTS

The Council's Technical Information Bureau will gladly help with problems on the use of Lead Sheet and Pipe in building work. Details of the main uses are given in a series of Information Sheets and Bulletins, which can be obtained by applying to the Council.

Well designed modern plumbing is compact in layout; for concealment and protection against frost damage main distributions are commonly fixed in ducts. Branch connections, usually short, from the main to the appliances and fittings, have to be fixed in a confined space.

LEAD PIPE is easy to fix even in the most difficult circumstances. The flexibility of the material is such that it is easily connected up to the appliances and fittings without risk of leaving a permanent strain on them.

By specifying lead or lead alloy pipe to the relevant British Standards:

B.S. 602/1949—Lead pipes for other than chemical purposes.

B.S.1085/1946—Lead pipes, Silver-Copper-Lead alloy

a material of consistent high quality is obtained.

Lead sheet, lead pipe and lead traps can be delivered immediately for all building work.

LEAD TECHNICAL INFORMATION BUREAU, 90 EBURY STREET, LONDON, S.W.1. TELEPHONE: SLOANE 0474

LEAD INDUSTRIES DEVELOPMENT COUNCIL, EAGLE HOUSE, JERMYN STREET, LONDON, S.W.1

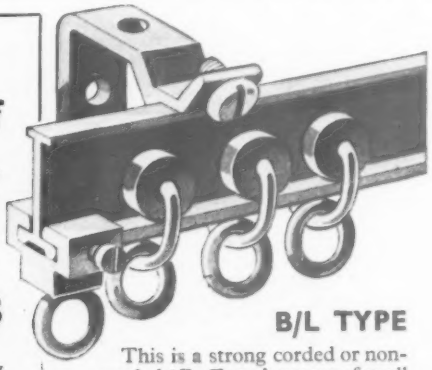
B103/2/53

Every new building calls for the specification of

'Rufflette' BRAND

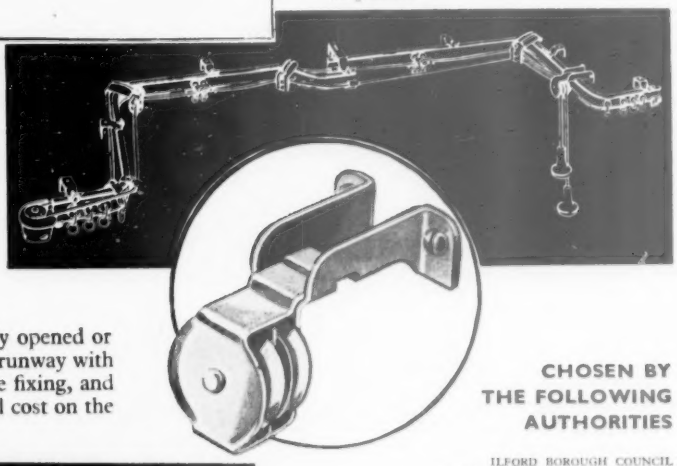
CURTAIN RUNWAY SYSTEMS

'Rufflette' Brand Runways, either corded or non-corded, are being increasingly used as landlord's fixtures in many new building schemes Full details will be supplied on request.



B/L TYPE

This is a strong corded or non-corded 'Rufflette' runway for all general purposes. Also available in plastic.



FOR BAY WINDOWS

'Rufflette' Brand Curtain Runways have been developed for every curtain suspension need. Shown on the right is the new cord-controlled 'Rufflette' runway for fitting to bay windows.

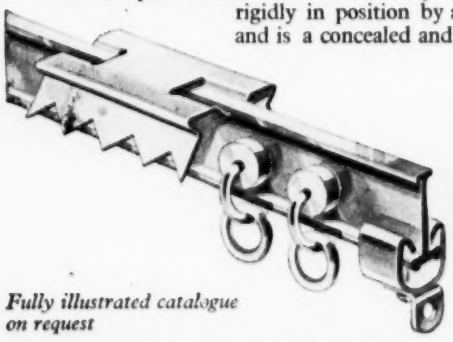
FOR STRAIGHT RUNS

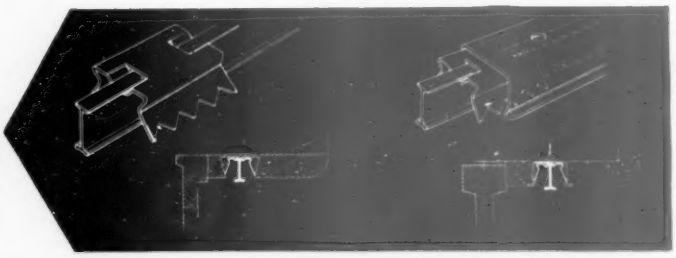
For straight runs, curtains can be effortlessly opened or closed with this 'Rufflette' cord-controlled runway with sliding overlap arm. Brackets are top or face fixing, and are designed to save valuable fitting time and cost on the job.

* *Note the curved travelling section which enables curtains to be overlapped without cutting rail.*

OR AS A BUILT-IN INTEGRAL UNIT

'Rufflette' Brand Recessed Curtain Runway is a permanent and integral part of building construction. It is inexpensive and can be fitted into wood or plastered lintels. The runway is held rigidly in position by a patent spring clip without screws and is a concealed and permanent fitting.





Fully illustrated catalogue on request

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★ Models indicated by this star are supplied with the Lacrinoid patent "floating spindle". This dispenses with the need of grub screws and ensures a rattle-free fitting for all normal door thicknesses. The following models can be supplied on request with "floating spindle" and fixed rose: 400, 300 and 290.

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Telephone: HORNCHURCH 2981 · *Telegrams:* LACRINOID, ROMFORD.

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Contractor: Messrs. Higgs & Hill Limited, Coventry.
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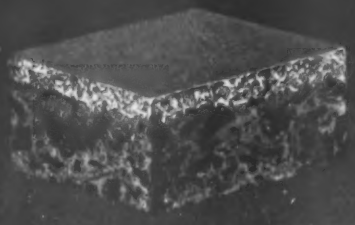
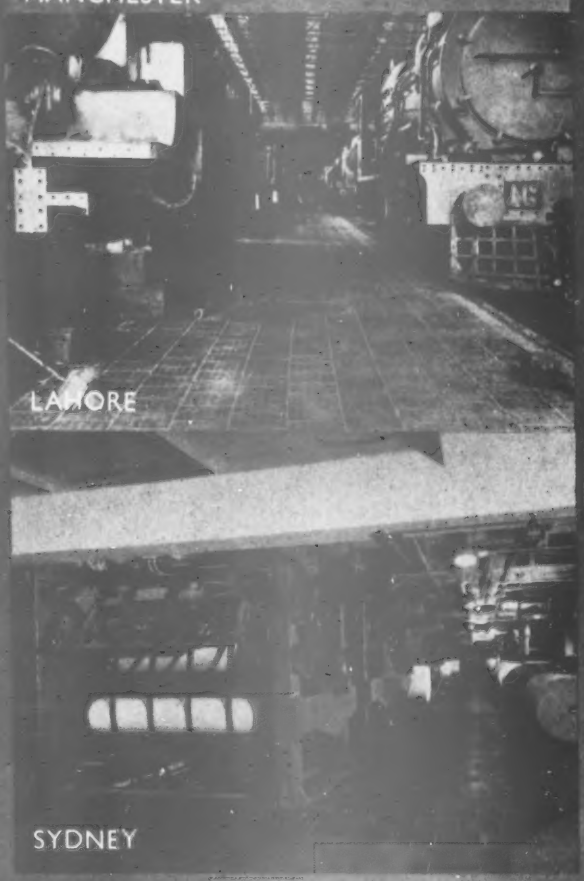
MANCHESTER



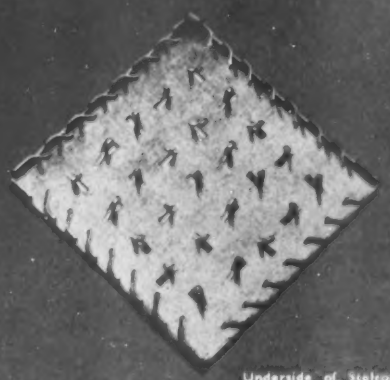
Section of a Stelcon Steel Clad Flag which shows clearly it's great density.

STELCON provides dustless hygienic floors of great strength and durability. That is why they can be seen in factories and on Docks in a great many parts of the world. It is just as easy for us to deliver overseas as it is to deliver here, and your enquiries will receive immediate attention.



LAHORE

SYDNEY



Underside of Stelcon Anchor Steel Plate showing the 53 Anchors which grip the concrete.

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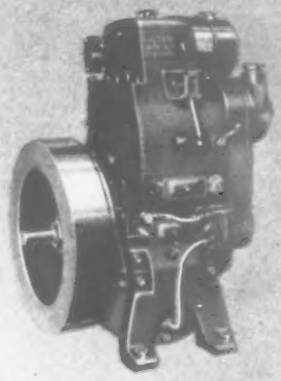
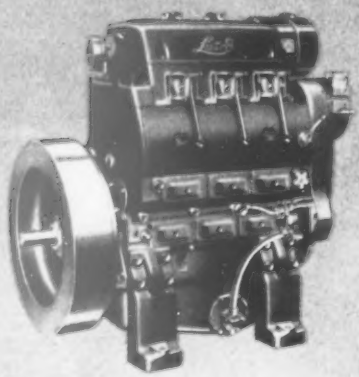
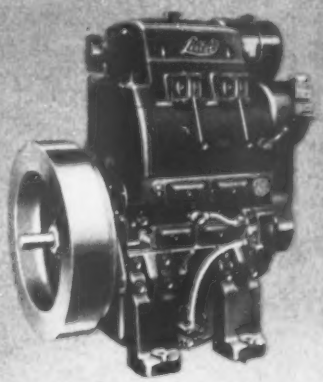


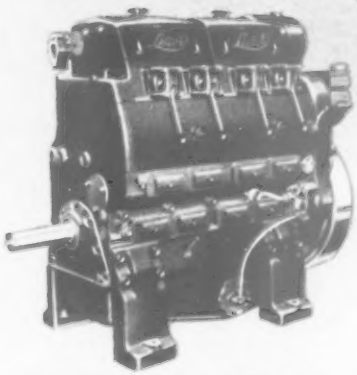
Type FR1 8 h.p. at 1,500 r.p.m.



Type FR3 27 h.p. at 1,800 r.p.m.

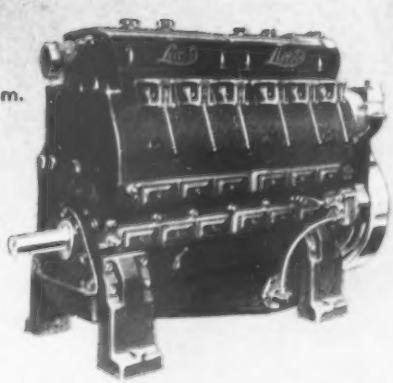


Type FR2 18 h.p. at 1,800 r.p.m.



Type FR4 36 h.p. at 1,800 r.p.m.

Any of these engines can be run at varying speeds down to 800 r.p.m. and supplied with Clutches; Reduction Gears; Housings; Electric Starting; Alternative Chassis Mountings; Speed Control; Radiator or Tank Cooling; Clockwise or Anti-Clockwise Rotation.



Type FR6 54 h.p. at 1,800 r.p.m.

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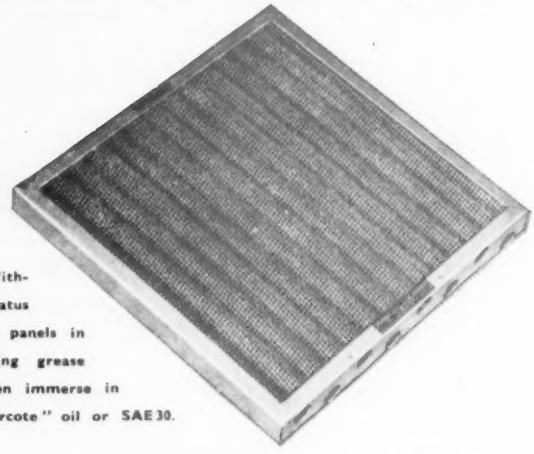

SERVICING. Without any special apparatus or materials; swill panels in hot water containing grease solvent and then immerse in Air-Maze "Filtercote" oil or SAE 30.

ARCHITECTS.
The efficiency of these filters demands that their specifications should be on your "ventilation system" file. Technical literature available on request to Air-Maze Ltd., Church Street, Warrington, England.

CW 2204/63

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TBW 4

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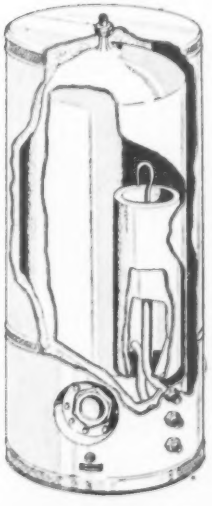

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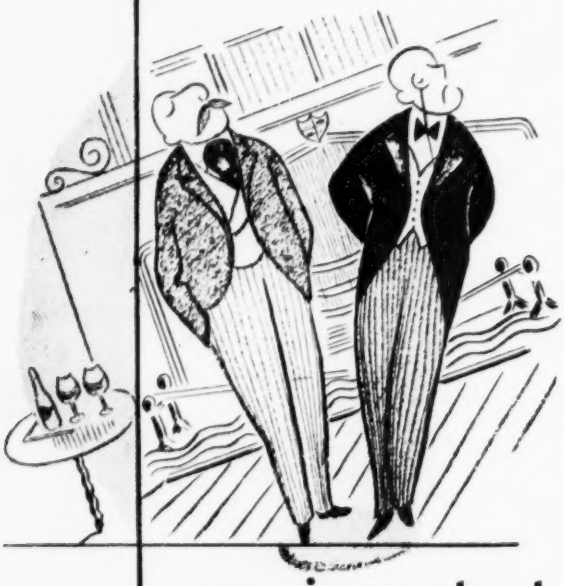

are important

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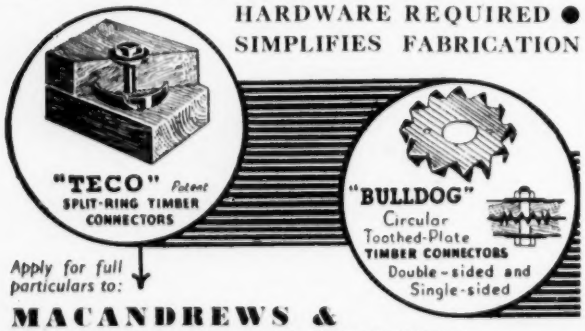

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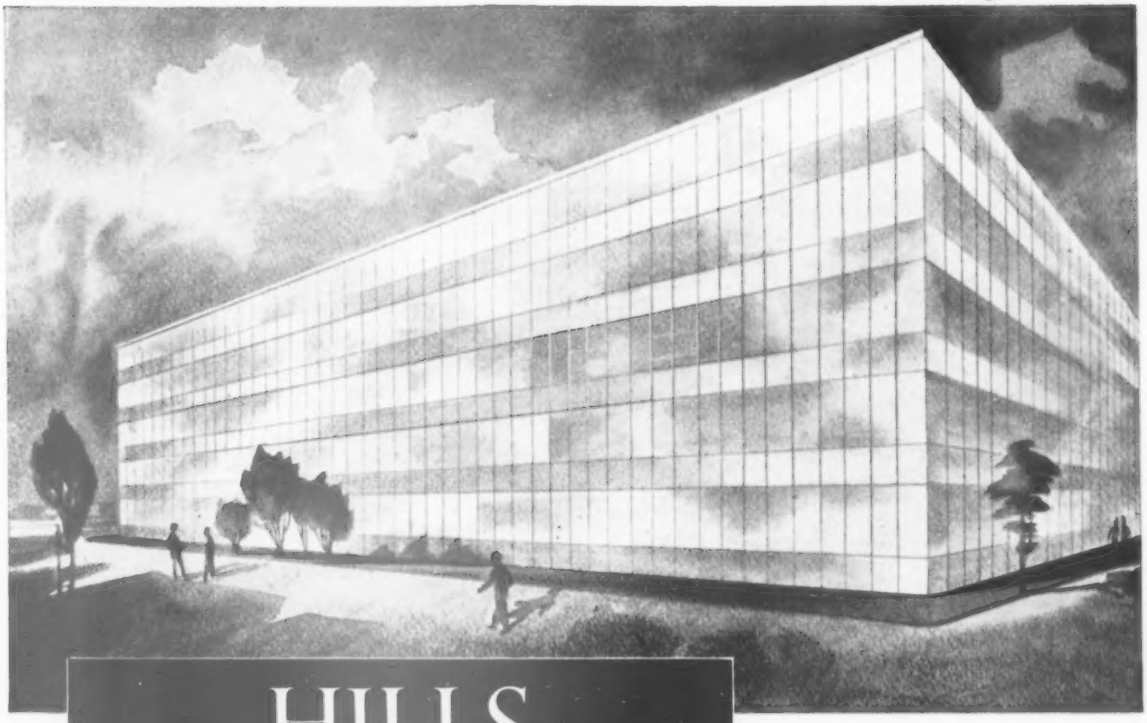

HILLS
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THE scientific application of glass to the roofs and walls of buildings offers one of the most economical forms of permanent external cladding known.

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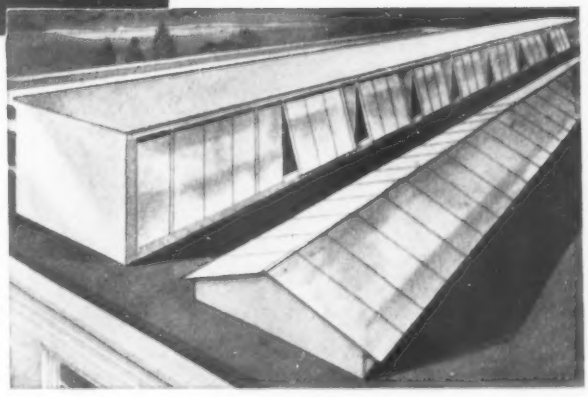

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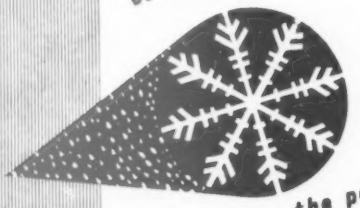

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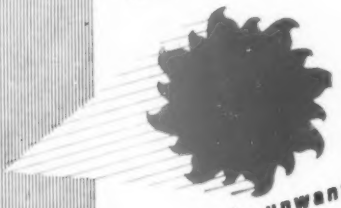

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Vol. 204 No. 4

THE ARCHITECT & BUILDING NEWS

July 23, 1953

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THE COST OF CONSTRUCTION

THE problem of housing, with its shortages and high costs resultant from the effects of war and increases in population, is not one which is inherent only to this country. However much we may consider that our past contributions to housing types and to garden city and neighbourhood planning have been such as to influence much of western Europe, the fact remains that there are intense problems concerned with housing and communal welfare which are global. The problems follow naturally the march of industrial development and the increase of a conscious appreciation of the significance of the individual and the civilized dignity of the community.

The greatest factor militating against satisfactory and progressive solutions for most housing problems is probably that of cost. Even shortage of labour and materials are factors which to some extent can be overcome by mechanization and substitution, but if the costs of these is to raise overall living costs above certain levels then they are methods which are better avoided than adopted. The levels of cost which govern the production of houses or slow down its incidence are economic, in the " scientific " sense of that word, and are related to limits of bearable taxation and the cost of living. Money costs money and the vicious circle of inflation is one that can operate even in limited fields such as housing.

Unlike other major industries, such as engineering, the building industry, which is responsible not only for housing but most other constructional works, has not so far been able to use modern technical developments to reduce to any great extent the cost of building. Not only is technical progress through research essential, but the full dissemination of results is the only method of ensuring that better organization of the industry and its products is forthcoming to meet increased demands for all types of buildings, particularly houses.

There may be plenty of reasons and excuses for the present state of the building industry in this country; sheer weight and bulk of its products, dependence on open sites as opposed to factory conditions, its multiplicity of small working units and the traditional structure of the industry generally. But the fact still remains that co-ordinated approaches to faster changes that shall suit new conditions of life and economy are badly needed and seem to be less appreciated here than in many other countries where similar problems appear.

These thoughts are engendered by the receipt of a document on the Cost of House Construction, from Geneva*, produced by the Industry Division of E.C.E. with the help of its Housing Sub-Committee. It will be recalled that the Sub-Committee was also responsible for the publication of one of the most comprehensive studies of international house types. The present study apologizes (too humbly we think) for necessarily inconclusive results; but there is no doubt that it does indicate an approach to solutions which do not involve pressing unduly the often-made analogies with mass production industries. " Close analogies tend at best to be Utopian and at worst misleading."

This study, while stressing that a number of necessary enquiries are already proceeding, either in the various countries or at Geneva, makes a number of recommendations designed to reduce the cost of building and to promote the development of the building industry, which recommendations are, incidentally, primarily directed to Governments. If the recommendations seem of a familiar character the study says it remains " necessary to reiterate what may appear to be simple truths, even truisms, until there is a marked change in practice in the building

* *The Cost of House Construction—A Preliminary Study of Measures to reduce Housing Costs and of the Development of the Building Industry.*—U.N.O., Economic Commission for Europe, Geneva. May, 1953.

industry." We make therefore no apologies for paraphrasing here some of the recommendations in brief :—

Long-term planned programmes promote stability in the building industry, provided they can be consistent with effective competition.

Unification of building regulations within a country and even, taking due account of climatic conditions, between countries, would be a considerable advantage.

Public bodies have not succeeded in reducing significantly the cost of house building. There is ample scope for private enterprise as well as public initiation, not least in the sphere of social housing.

The building of a sufficient number of houses on each individual site should be encouraged, provided that scales of operation are not so large as to interfere with the maintenance of effective competition.

Smaller building firms should be modernized and co-ordinated.

Governments have a special part to play in encouraging new techniques and new materials. There is no reason why considerable public funds should not be set aside for this purpose. It may be the cheapest thing to do in the long run. It is essential that Governments promote development and the application of standardization of all kinds, including modular systems.

Research and a wide dissemination of scientific and technical information in documented form is of great value. Governments should see to these things and give practical support to all efforts in this direction as a part of a co-ordinated plan for the reduction of costs.

EVENTS AND COMMENTS

PRIZE DAY AT THE A.A.

Taking advantage of the entente between the A.A. School of Architecture and the Royal College of Art, the R.C.A. inserted the thick end of the wedge in the shape of Mr. Barnett Freedman, C.B.E., R.D.I., A.R.C.A., who gave the prizes and addressed the students at Bedford Square last Friday.

Sir Hugh Casson, making his first official appearance as President, performed his duties most agreeably, and the Principal, Mr. Michael Pattrick, gave an extremely able and interesting survey of the climatic changes in architectural education over the last 20 years or so. His remarks were very much to the point and will make a good basis for plotting the course from now on.

Mr. Freedman was expected to be witty and he was. But he was much more. He paid the A.A. students the compliment of speaking from the heart, without notes, and they listened to the true voice of the artist-anarchist. Mr. Freedman told them to starve (but not to death) rather than let buildings be designed by the customer. "Walk out if the lady of the house wants pink when you think it should be blue." He ended by saying that architects should be good to the painter, following a rebuke to the A.A. for not inviting over the last 100 years any of the great painters to address them. Apart from the amateur, Sir Winston Churchill, he, Mr. Freedman, was the first painter to be invited; why, he asked, had the A.A. not got Turner, Rosetti, or even Delacroix or Renoir to address the students. Mr. Freedman, accordingly, made up for lost time. One was left wondering what would happen when the uncompromising architect met the uncompromising painter to discuss the mural decorations that Mr. Freedman advocated so eloquently. Mr. A. Diprose, Chairman of the Students' Committee, spoke last. Architecture today, he said, was in the melting pot and had lost its sense of direction. (In a melting pot one would, of course.) He urged us to climb out and get back on course. This view seemed to tally pretty well with Mr. Pattrick's speech. Altogether, the students and parents were told the truth, the whole truth and nothing but the truth, and must have gone away in a chastened mood, the students to practise austere living in preparation for the ordeal of spitting in the eye of their first client, and the parents to put enough by to support them meanwhile. Altogether, a good afternoon in the best A.A. tradition. Behind the gloom, all, one felt, was well.

BELLOC

I met Hilaire Belloc only once, and did an illustration for a short article of his. He seemed an English Institution, and his death by a "household accident" is a tragic anti-climax.

To misquote Mr. Ogden Nash, "He was a who than whom none was whomer."

Belloc's *Cautionary Tales* have always been favourite reading with me and so memorable that I can never see the name "Horne" on a shop fascia or notice without muttering "Godolphin Horne was Nobly Born:

He held the Human Race in Scorn. . . ."

On the other hand, his uninhibited passion for Sussex I found rather embarrassing and his poems about that county, although, no doubt, sincere and deeply felt, made me feel as if he was wearing his heart on his smock.

THE CHILD IS F. TO THE M.

The children's playground alongside Waterloo Bridge has been in use for some time, and the children seem to enjoy themselves. It is not so easy as one might think to devise the things that give continual pleasure to the young, are indestructible and can cause no hurt. The L.C.C. are to be warmly commended for their "gymnasia." To my eye, one or two of the objects are a bit like "Toyland," whereas the motor van and blocks in the sand pit look just right. The open space, which has been steadily added to, is now a really remarkable oasis in the desert of bricks and mortar, and well worth a special journey to see, and one would not be ashamed to take a cultured foreigner there, except that the usual

L.C.C. children's play area near Waterloo Bridge. Photos by John McCann

morons have slightly fouled the ornamental water with paper, tickets, etc., but much less so than might have been the case, judging from the frequent news items on vandalism. The flower beds continue to be a joy.

LANCASTER HOUSE

The Ministry of Works has done another very good restoration job on Lancaster House, and we can recommend all readers to find the time to go and have a good look. The building has had a moderately chequered career, having been built in 1825 by Benjamin Wyatt, and added to in 1842 by Sir Robert Smirke, while from 1912 onwards it became the London Museum under a trust fund provided by the late Lord Leverhulme.

The 1940 bomb damage has now been repaired, and there have also been other improvements to make the building suitable for Government entertaining and for international conferences. This is the sort of work the Ministry does extremely well, with care and discretion, and with the essential modern equipment adequately concealed. It is good to realize that we can still produce this sort of craftsmanship. Whether we shall still be able to do so in 30 years' time is perhaps doubtful : if the present shortage of apprentices goes on there may just not be the men with the skill to do the work.

INEVITABLE ECONOMIES

There have been a few complaints lately about the absence of bookshelves in local authority housing, but however deplorable this may be socially, the reason is obviously due to cost. It is all very well to say that food for the mind is as important as kitchen cupboards for storing food to eat, but in fact bookshelves are easily enough put up by those who want them, and cannot be called expensive. As we all know, tenders are always higher than one had been hoping, and non-essentials are the first to go, even if they mean the saving of only a few pounds per house. What about picture rails, or, for that matter, TV aerials. No doubt all houses should have everything, but not, unfortunately, yet. If the tenants are people who buy books, then the shelves will appear; if not, the presence of shelves will never make them read.

PORTLAND BILL

The Blue Circle Cement Group has adopted a manikin called "Portland Bill" who will be to them what Mr. Therm and Mr. Cube are to their respective owners. Since Eric Fraser designed Mr. Therm in 1933 or thereabouts, there have been enough of these whimsical characters to justify a "Who's Who," but presumably they pull their weight or they would not be so popular with the publicity boys. The name "Portland Bill" is both apt and memorable, and we welcome him with a wry smile and the hope he is the last of his line.

FESTIVAL GARDENS

The Pleasure Gardens at Battersea Park were in the news last week with a row in the L.C.C. over the price of buildings and a reduction from 2s to 6d for the price of entrance. It appears from the Parks Committee's report that the net figure of £52,130 which the L.C.C. are now being asked to pay for the riverside refreshment house and concert pavilion is the cost of the two buildings as certified by the quantity surveyors plus professional fees. The abnormal costs which the report describes as "attributable to speed and the special circumstances in which it (the Festival Gardens Co.) worked" are not included. The capital expenditure which the Council approved in March was £34,355. The L.C.C. have now bought these buildings.

Last Saturday was the first at the reduced charge for entrance to the gardens. The attendance we are informed was well below normal, undoubtedly helped by the thunderstorms in the afternoon. But on Sunday, with brighter weather, the attendance was better. Last year the reduction of the entrance charge half-way through the season brought disappointing results and this year's start at the cheaper rate predicts nothing better. Is there any truth in the rumour that the gardens are to be closed permanently in October?

We would like to see a simplified version of the gardens —the upkeep cost of the present ones must be fabulous— as a permanent amenity free and open to the public all the year round. But by all means scrap the fun fair and let's have more open grassland for the youngsters of the neighbourhood to play in.

NEWS OF THE WEEK

International Federation Congress

Not since 1930 has the International Federation of Building and Public Works met at a major meeting in this country as was held all last week. The general assembly of delegates of 17 different nations discussed matters which included: the guaranteed wage in the construction industry; the financing of European main highways; the impact of big development schemes on national economic activity; productivity, and the European financing of housing construction.

The delegates were welcomed at the R.I.B.A. by Sir David Eccles, Minister of Works, who officially opened the Assembly last Monday week. During the week visits were made to: Windsor Castle, Stratford-on-Avon and the Aldershot Tattoo. On Friday the Conference closed with a dinner and dance at the Dorchester Hotel. Guests were received by the Chairman, Mr. Wilfred Horsfall, President of the N.F.B.T.E., and Mrs. Horsfall, Monsieur E. Frankignoul, the retiring International President, and Monsieur A. Borie, the newly elected International President, and Madame Borie. The menu card was decorated with the coloured flags of the seventeen nations represented, and the speeches after the dinner were relayed in both French and English. The speakers were: Sir Walter Monckton, Minister of Labour and National Service; Monsieur François Buche, Vice-President, President Société Suisse des Entrepreneurs; Sir Andrew MacTaggart, Vice-President, Past President F.C.E.C.; Monsieur Edgard Frankignoul, International President; Monsieur A. Borie, of France, newly elected International President; Mr. S. D. C. Kennedy, Hon. Treasurer, Master Builders' Federation of Australia; Sir George M. Burt, Past President, President F.C.E.C.; and Mr. Wilfred Horsfall, President N.F.B.T.E., who made the first and last official speeches of the Conference. M. Frankignoul, the retiring President, who is widely known in many countries as the inventor of the Franki-Pile, has been President since the re-establishment of the International Federation in 1948. During the speeches he was presented with a portrait in oils of himself. The remainder of the evening passed pleasantly enough with dancing to Sydney Jerome and his excellent dance orchestra. A cabaret at midnight featured the Royal Command juggler, Henri Vadden; Henderson and Henshall, the World's champion ballroom dancers; and the Kelly Bros., internationally famous balancers whose feats must be seen to be believed.

No-fines' flats at Coventry built by George Wimpey & Co., for D. E. E. Gibson, City Architect of Coventry.

IN PARLIAMENT

Steadying the Boat

A string of questions about housing policy and programmes, natural and local, were put to the Minister of Housing and Local Government. They reflected the anxieties of some local authorities caused by reduced allocations, and ranged from the critical "to what extent is the Minister compelled to curb the expansion of the housing programme owing to shortage of bricks" to the helpful "what is being done to maintain the housing programme at 300,000 houses a year."

In the absence of Mr. Macmillan, who was in hospital, Mr. Marples, the Parliamentary Secretary, made the following statement: "There has been no cut in the programme. We are now building houses at the rate of about 300,000 a year. The bricks and cement available for housing will not support a programme at more than that rate. We must, of course, allocate building materials, including bricks and cement, for other essential needs, such as factories, schools, etc.

"We are, therefore, steadying the programme at its present high level by matching the number of houses starting with the bricks and cement available. Too many starts would mean too few completions because the bricks and cement would not go round. Individual local authorities who have not been given immediate approval for all the tenders they would like should remember two things: first, the rate of house-building in Britain has increased by half since we took office; second, the action we are taking will help every local authority to finish the houses they are now building by avoiding delays on sites, and ensure that their programme will run smoothly on into 1954.

"We shall build many more houses to let this year than ever before. Side by side with this, we expect to see more houses built for owner occupiers. The Government feel that it is only right that people who wish to put their own money into building a house should be able to do so." (July 14.)

Bedroom Standard

An analysis of the changing proportions of one-, two- and three-bedroom houses in approved tenders for local authority and new town building was given on July 14 by Mr. Marples. The comparison is between the first quarters of 1952 and 1953, and covers houses and flats. In the following figures the numbers and percentages relating to houses only are given in parentheses.

ONE-BEDROOM.—1952, 2,961, or 7.7 per cent of the total (770 and 2.7); 1953, 4,087, or 8.4 per cent of the total (1,352 and 3.6).

TWO-BEDROOM.—1952, 14,706, or 38 per cent (8,706 and 30.2); 1953, 17,766, or 36.5 per cent (11,308 or 30.1).

THREE BEDROOM.—1952, 20,244, or 52.4 per cent (18,792 or 65.1); 1953, 25,979, or 53.4 per cent (24,347 or 64.7).

MORE THAN THREE-BEDROOM.—1952, 743, or 1.9 per cent (587 or 2.0); 1953, 795, or 1.7 per cent (591 or 1.66).

EXHIBITION

July 30 to August 21. The R.I.B.A. Travelling Exhibition "Homes and Surroundings" will be shown at Manchester City Art Gallery. Admission free.

ARCHITECTURAL ASSOCIATION SCHOOL OF ARCHITECTURE: END-OF-TERM ADDRESS BY THE PRINCIPAL, MR. MICHAEL PATTRICK, A.R.I.B.A., A.A.DIPL.

MR. PRESIDENT, Ladies and Gentlemen. Before the distribution of the prizes, it is customary for the Principal to address you briefly on some aspects of architectural education. Last year, I talked about the difficulties of finding employment for the newly trained architect. Now, after this session, the A.A. and other schools will have returned to about their pre-war complement, and the problems of absorption into the profession should gradually diminish. Certainly, the student should not be concerned with worries of employment during his training. He and the Staff should be free to grapple with purely educational issues. At the moment these are of a rather less tangible nature, but they would seem to have their roots in the growing uncertainty about the direction of architectural philosophy, so it is about this that I should like to talk today, especially from what I consider might be the students' point of view.

It is unfortunate, but inevitable, that the architect's training must be based on imaginary projects. His designs can never go beyond the drawing board, and it is therefore more important for him than those studying for other professions to have the impetus of an underlying fervour which is so vital to the development of creative ability. In the past this has often been kept alive by some enthusiasm related to architecture, but often quite unconnected to his school work.

If one looks right back to the late twenties, or early thirties, when what were known as modern designs began to appear in the A.A., the impetus was undoubtedly one of novelty. I was a student here at this time, and I can remember the excitement that we felt in exploring the new architecture. Any building that appeared in this manner was loudly praised, though the praise was sometimes indiscriminate. It did not seem to matter much that our programmes were unrealistic, for we all shared in an eagerness to join in the great battle for the modern movement.

Later on, about the middle thirties, a new phase opened, for although the battle was far from won, the student had learnt to distinguish between sincere and mock modern. On the Continent, there was sufficient work of real quality to prove that the new ideas had really brought into play visual expressions hitherto unexplored. There was something about these new buildings that was so compelling that their virtue just had to be recognized. So if the first wave of enthusiasm was based on rather flimsy ideas, the student in this next period was carried along by a very deep conviction.

Following on this, in about 1936, some other factors also began to play their part. Much of the new work related to housing. Architecture was on the move, but so was sociology, and, if anything, the latter was slightly in the lead. To the student of this generation, the important thing was that both were travelling on the same road and this road seemed to lead to a brighter and better world for everyone. Once more we were learning from the Continent. Those who went abroad returned with a desire to put these theories into practice in their own country and, not unnaturally, they were affected by the comparison of co-operative and socialized building in Scandinavia, and free enterprise and ribbon development at home. If the earlier appeal of novelty had worn thin, the students' efforts were now goaded on by a much more compelling spur of social conscience.

I know it is a commonplace that young people are often attracted to socialism, but I think it is sometimes misunderstood how greatly these sincere feelings have affected the growth of the modern movement.

When the studio projects carried with them a sort of profession of faith, the student felt that his statement in design had become something more than old remarks made in a new vernacular. It had gone beyond a mere commentary on the shape of building. As he saw it, it was a renunciation of a pre-war disorder, and in this form it was exciting and immensely stimulating. Throughout the whole of the pre-war decade, the architectural student was helped in his work by this added interest.

Then just as things began to get under way there came the long, trying interlude of the war, and for architecture, it was to be six years of wasted time. But, in the wider field of Town Planning, the destruction brought about by the war soon made imperative the legislation which a few years before had seemed almost Utopian, and when the war was over once again for the ex-service student, the profession of architecture held tremendous promise. The idea of taking part in the rebuilding of our towns was in itself a first-rate stimulus to training. All the schools were packed to overflowing, accommodation was cramped and Staff were scarce, but the students' enthusiasm was unbounding. This was to be the epoch in which all those hopes and desires of pre-war years could be translated into reality. The war had produced some new materials, and these, when coupled with the technique of factory production, seemed to suggest some definite improvements in the building industry. No longer would the demand for building rest on the munificence of the private client; the Welfare State required many and varied buildings, so here at last was the opportunity for the young architect to play his own, important part in the shaping of a physical environment.

Besides the interest in new materials, there was another, and perhaps a deeper, interest in the purely visual and philosophical side of architecture. In those corners of the world where the war had not reached, there had been one or two interesting developments. In Central and South America, architects had been putting into practice some of the more advanced architectural theories of pre-war Europe. Thus the ambition of the immediate post-war student was to get out and get to grips with the problem of rebuilding as soon as possible, and it was not until as late as 1949 that one began to detect just a slight flagging in enthusiasm. Looking back it is surprising that some reaction had not set in before.

For too long spirits had been buoyed up with the promise of a great post-war revival in building. In reality after four years of peace we had produced nothing but a series of economic crises and hardly any building. The new materials were not readily accepted by the industry, and those students who had entered practice found it needed superhuman efforts to get anything built at all. The reaction was not sudden but gradual. In the students' minds there was a certain impatience but plenty of hope. If the new materials were still over the horizon, some new methods with old materials were producing interesting results, especially in the building of schools. The Concert Hall and the 1951 Festival Buildings had been started on the South Bank. So perhaps the new era would really be getting under way before long. There was apprehension, but only a slight falling off of vitality in the student's work, and at this time, most important of all, there were still plenty of jobs open to him when his training was finished.

Now a review of the last four years as seen from his point of view, has been far from reassuring. Gradually the profession was becoming overcrowded, jobs were beginning to get scarce, and the type of job wanted even scarcer. The situation in 1951 and 1952 was doing something more than take the edge off the students' enthusiasm, and recently there have been other factors quite apart from economics which have also acted as a drag on training, and here the most important thing is that the whole pace of architectural development seems to have been retarded. For the immediate pre-war and post-war students, contemporary design could be said to be

travelling along two or three slightly separate lines of advance, though each subservient to a dominant idea.

Each of these lines of development seemed reasonable, and according to his preference the student's Travel Scholarship might take him to Stockholm or Taliesin, and later to Chicago or Marseilles. Until quite recently everything appeared to be on the move and there was much debate as to which philosophy might ultimately play the leading part in a fully worked out International style.

In the last two years the whole movement has slowed up, and the work of the masters has tended to be so repetitive that it looks as though their last words might have been said. Even the critics and philosophers seem doubtful about which way to turn. Their language has tended to become more obscure, and recently their message has carried several rather obvious "don'ts" and only a few but much less obvious "do's." In fact, never before has the vocabulary of architectural criticism been so full of strange and unusual words used to explain quite simple and ordinary things.

For a variety of reasons, most of them unacceptable to students, post-war building in England has made really very little advance over the 1930s. Nearly ten years after the war there is still no sign of mechanization in the building industry, and, despite apprenticeships schemes and technical colleges, the only noticeable change is a steady decline in craftsmanship, and the builders' desire to stick rigidly to contractural methods which often tend to waste both the architect's time and his client's money.

I think some of you may feel that these remarks on the present state of architecture and building are exaggerated and unnecessarily gloomy. Perhaps in some measure they are, but as I said earlier, I was trying to show you the picture from the students' point of view.

You may also consider that the mere pursuit of a subject as exciting as architecture, is in itself sufficient stimulus to carry one through the "make believe" period of school training, and of course for many students, particularly those who show real promise, this is true. However, we would be quite wrong to overlook the fact that there really have been some underlying influences which helped in the past and are not with us to-day, so we must show an understanding for the student, who, at the moment, seems bewildered and disappointed.

He is entitled to our sympathy, but he need not feel downcast. First of all he should realize that in any time of marked architectural change, it is the period of development and refinement that produces work of real quality and lasting value, often far superior to the tentative attempts of an earlier generation.

The first battle for the modern movement may have been won, but the field has to be held and consolidated. And as many concerned with military operations will know, this is a far more important, if less spectacular, feat than the original assault. Secondly, he would do well to reserve his judgment about the possibilities of a completely international style. If Italy and Scandinavia have produced a satisfactory idiom for their own buildings, the same cannot yet be said for England. There is much need for further work to produce building that is a credit to the basic ideals of the modern movement, and at the same time pays due respect to our climate and national characteristics.

Our standard of detailing is deplorably low, and practising architects could go a long way to helping students and improving the whole state of building if they would resist much more vehemently the growing tendency to substitute quantity for quality.

It is not only the small things in architecture that deserve the student's attention. Right at the other end of the scale, in the sphere of Town Planning, there is room for improvement. Our new towns, with their very low densities have given the citizen more light and air, but have done so at the expense of any feeling of community.

How this difficult problem may be solved we are none of us sure, but there would seem to be room for a basic change in one's approach, and here let the student with fresh ideas take heart, for it is fresh ideas that are needed.

Some hint of these ideas may be seen in the Thesis work of the Exhibition, which we have opened this afternoon. It is only just a hint, but it shows enough to make us see what an enormous range of possibilities in town design still lie unexplored. These designs should not be considered as fully worked out solutions, neither should they be dismissed as pure fantasy. They are an honest attempt to say something new in terms of architectural expression and human needs. If the student of to-day finds post-war conditions a bar to the type of architecture which he feels we ought to have, he should realize that it will not always be so. Only a fraction of what has to be built has already been done, and ultimately it will be his generation and not ours that will bring the modern movement in architecture into true fruition.

Architectural Association School of Architecture Award of Prizes

FIRST YEAR: Howard Colls. Travel Scholarship. Value: £40. Miss J. Bridgwater.

SECOND YEAR: A.A. Travel Scholarship. Value: £40. C. J. Stokes.

THIRD YEAR: Holloway Scholarship (for study in some field of building practice). Value: £180. M. G. Ascott.

A.A. Travel Scholarship. Value: £40. C. D. Milne.

FOURTH YEAR: Roland Wilmot Paul Travel Scholarship. Value: £40. E. M. Waterston.

R.I.B.A. Henry Jarvis Scholarship for Construction. Value: £50. A. J. Wylson.

FIFTH YEAR: Henry Florence Travel Scholarship. Value: £50. D. J. Oakley.

Scholarships and Grants Awarded to A.A. Students

Scholarship awarded by Imperial Chemical Industries, Ltd., to a student in the fifth year for travel and study of decorative arts in Europe, to an approved programme. Value: £250. Anthony Mauduit.

Scholarship awarded by the Building Centre to a student in the fourth or fifth year for research into use of building materials, to an approved programme. Value: £100. Brian Falk.

Walpamur Colour Prize. Value: £15. J. E. Sayers.

Alec Stanhope Forbes Prize for the best colour work during the session—books. Value: £5. J. Burkett.

A.A. Essay Prize. Value £21. J. B. Lehrman.

A.A. Measured Drawings Prize. Value: £20. A. G. Mitchell.

Prize in Design presented to a student of the Royal West of England Academy School of Architecture, Bristol. Value: £5 5s. A. M. Thompson.

Medal presented annually by Le Societe des Architectes Diplomes par le Gouvernement, Paris, to the best Diploma student of the session. H. G. S. Peacock.

Award of Scholarships Tenable at the A.A.

The Leverhulme Scholarship. Value: £2,000. J. R. Plant (Carlisle Grammar School and Carlisle School of Art).

The Natural Asphalte Council Scholarship (presented by the Natural Asphalte Mine-owners and Manufacturers Council). Value: £50 p.a. P. G. Wentworth-Shields (Westminster School).

ANNOUNCEMENT

The A.A. Library will not open on Saturdays during August. It will also be closed during the first week of September.

APPOINTMENT

Mr. F. Hamer Crossley, F.R.I.B.A., County Architect for Derbyshire, has been elected President of the Nottingham, Derby and Lincoln Architectural Association.

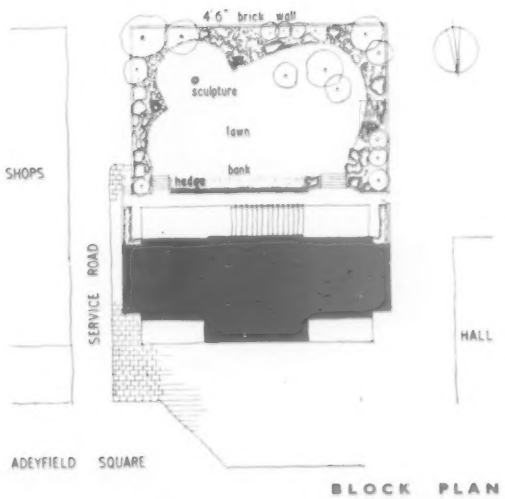
PARTNERSHIP DISSOLVED

Paul Kennerell Pope, A.R.I.B.A., announces that on June 30, 1953, the partnership of Tew, Pope & Oliver was being dissolved and that after that date he will be practising independently at 18, Brock Street, where he is in association with Messrs. Snailum, Huggins & Le Fèvre. Telephone: Bath 60458.

The New Venture Public House at Adeyfield

FOR HEMEL HEMPSTEAD DEVELOPMENT CORPORATION

chief architect: H. KELLETT ABLETT, F.R.I.B.A., M.T.P.I.



BLOCK PLAN

THIS Public House is situated on the south side of the Queen's Square, Adeyfield, a Neighbourhood Community and Shopping Centre designed by the Chief Architect's Dept. The building forms part of the architecture of the square; the canopies of the front elevation echo the pattern of shop canopies on the north and east sides of the Square and the height of the public rooms is in relationship to the height of shops.

The Public House is of traditional brick construction with 11in cavity walls, concrete floor to ground floor; suspended reinforced concrete floor to first floor; slated roof over the central portion of the building and reinforced concrete flat roof to remainder. The facing bricks are kiln stocks and the slates are Westmorland Green.

A low pressure hotwater heating boiler and a domestic hotwater boiler, both fired with solid fuel, are installed

PUBLIC HOUSE AT ADEYFIELD

in the boiler room. The fuel store adjacent to the boiler room has fuel access at the front facing Adeyfield Square. A domestic fuel store is also provided.

The floor area of the beer cellar is 612 square feet. The floor is laid with falls to central gulley and finished with acid-resisting asphalte. The walls are fair faced brick, distempered. A total of 34ft run of timber stillage is provided. The Beer Cellar is insulated from the Boiler Room by two 9in walls 1ft 6in apart and filled with earth. Barrel access is by ramp from the front facing the Queen's Square.

The Bottle and Wine Store is 288 square feet in area. The store is separated from the Beer Cellar by 11in brick walls, but has communicating doors. The floor and wall finish are similar to Beer Cellar. A hand-operated beer case hoist serving both the Bottle Store and Beer Cellar is installed. Wood and metal wine storage bins are provided.

In the Public Bar the woodwork finishes are generally in Oak including flush panel doors, door frames and the panelling to the drinking alcove. The counter is also constructed of solid Oak. The fireplace is built in multi-colour Chesham facing bricks with purpose-made dog grates. Walls and ceiling are painted and the floor is generally finished in asphalte tiles. In the Saloon Bar the finishes are similar except for the flush panel doors and part of the panelling in the Bar which are in Sapele hardwood. In the Lounge Bar the door frames and architraves are in Oak with French Walnut flush doors and Walnut panelling to the drinking alcove. Walnut is also used for the bar front and top.

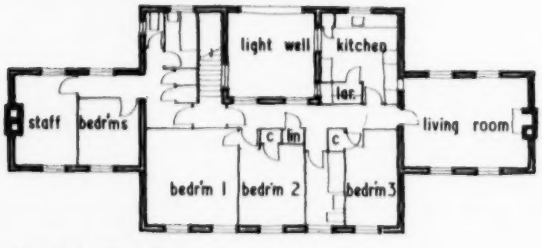
A certificate of merit for craftsmanship has been awarded by the Hertfordshire Chapter and the Essex, Cambridge and Hertfordshire Chapter of Architects, to the Central Shopfitting Co. (London) Ltd., for their work in connection with the Bar Counters and services fixtures and panelling to bars.

A service area is provided to serve all bars. This is fitted complete with oak shelving for bottle display and fixing of optics with mirror backing, cupboards, drawers, potboards, etc. The beer case hoist delivery is situated in the back fitting to the Saloon Bar service, but is concealed in the fitting by sliding doors. The floor is raised 3in above general bar floor level and is formed with boards finished with linoleum.

The serving part which is provided with shelving from floor to ceiling on one wall has a counter complete with drawers, shelves and lifting flap constructed with Oak front and top.

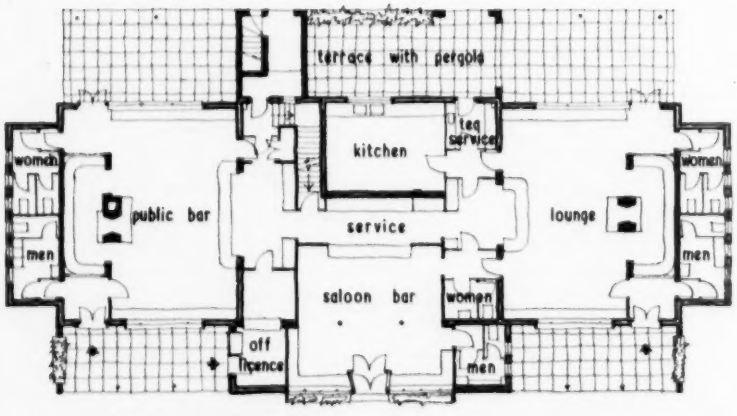
The floor finish to serving side of counter is wood boards and on public side heather brown quarry tiles. A small show case is incorporated in the window facing on to the verandah.

Assistant chief architects were P. R. Bee and H. Schofield and the senior architect in charge was D. A. H. Ritchie; quantity surveyor: H. J. Venning & Partners; Heating & Electrical & Ventilating Consultant: W. N. Mann.

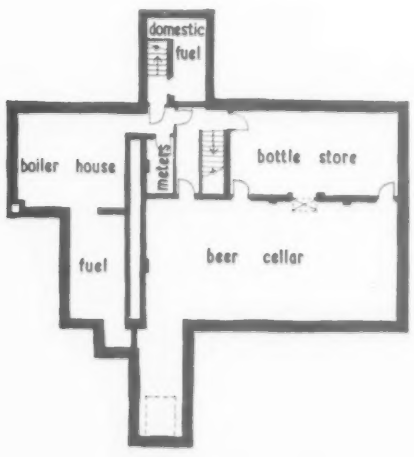


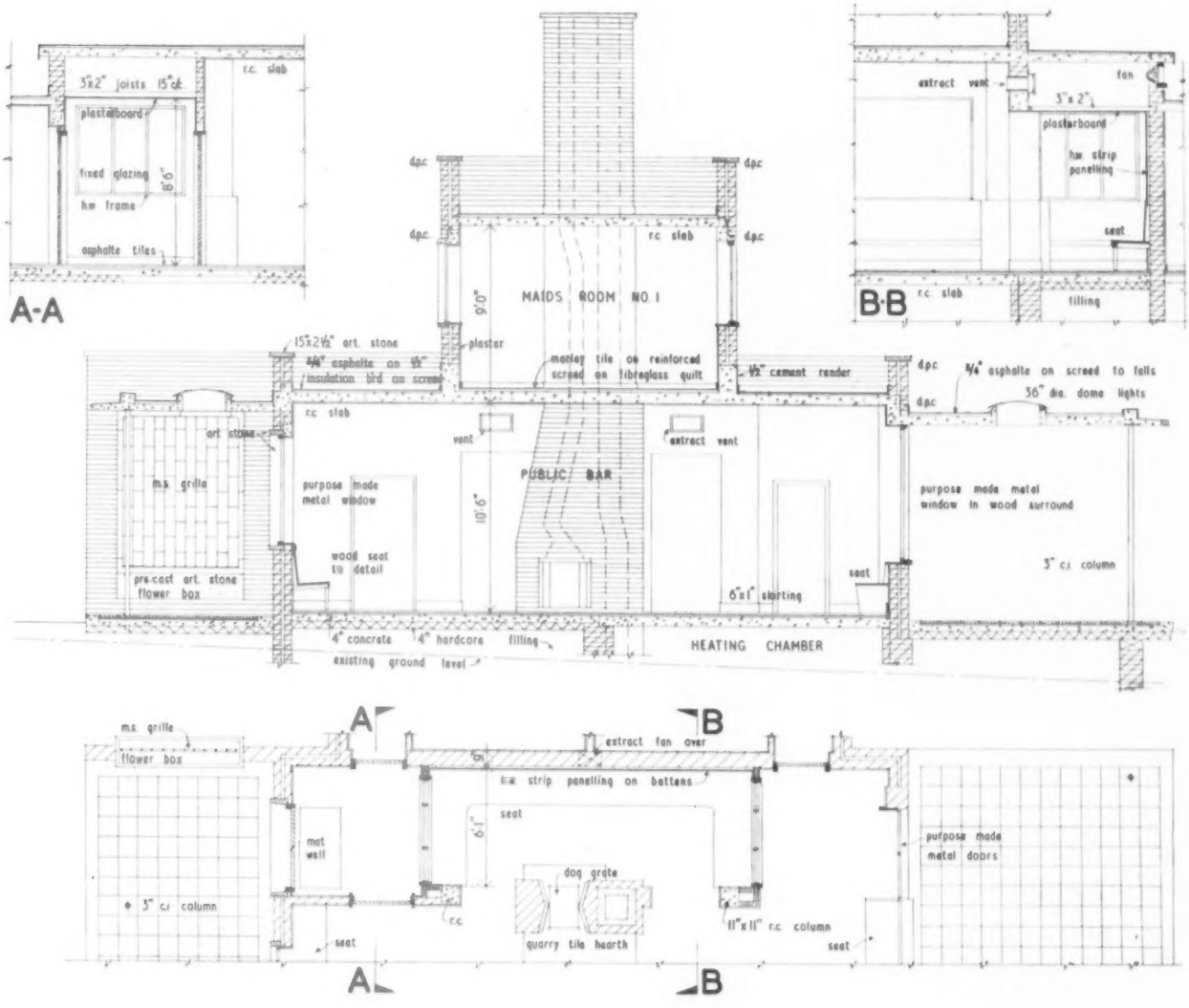
FIRST FLOOR

General Contractors: W. King & Sons, Ltd. *Bar Counters, Service Fixtures, Panelling and Seating:* Central Shopfitting (London), Ltd. *Basket Grates:* Bratt Colbran, Ltd. *Cellar Flaps:* Haywards, Ltd. *Cellar Hoist:* Gibbs Bros. & Lucas, Ltd. *Doors:* F. Hills & Sons, Ltd. (General) Successors to Shapland & Petter (Veneered). *Electrical Installation:* Barlow & Young, Ltd. *Floor Finishes:* Gabriel Wade & English, Ltd. *Glass Dome Lights:* R. Seddon & Sons, Ltd. *Glazed Wall Finishes in Lavatories:* John Ellis & Sons, Ltd. *Heating and Hot Water Supply:* W. Lamb (Plumbers), Ltd. *Ironmongery and Door Furniture:* Nettlefold & Moser, Ltd. *Lettering:* The Lettering Centre. *Metal Flower Boxes:* Clark, Hunt & Co., Ltd. *Metal Grilles:* G. F. Baker. *Metal Windows:* Crittall Manufacturing Co., Ltd. *Pewterage, Wine Bins and Stillage:* W. R. Loftus, Ltd. *Reinforcement for Floors and Beams:* Twisteel Reinforcement, Ltd. *Sanitary Fittings:* Sharpe & Fisher, Ltd. *Soft Furnishings:* Benskins Watford Brewery, Ltd.

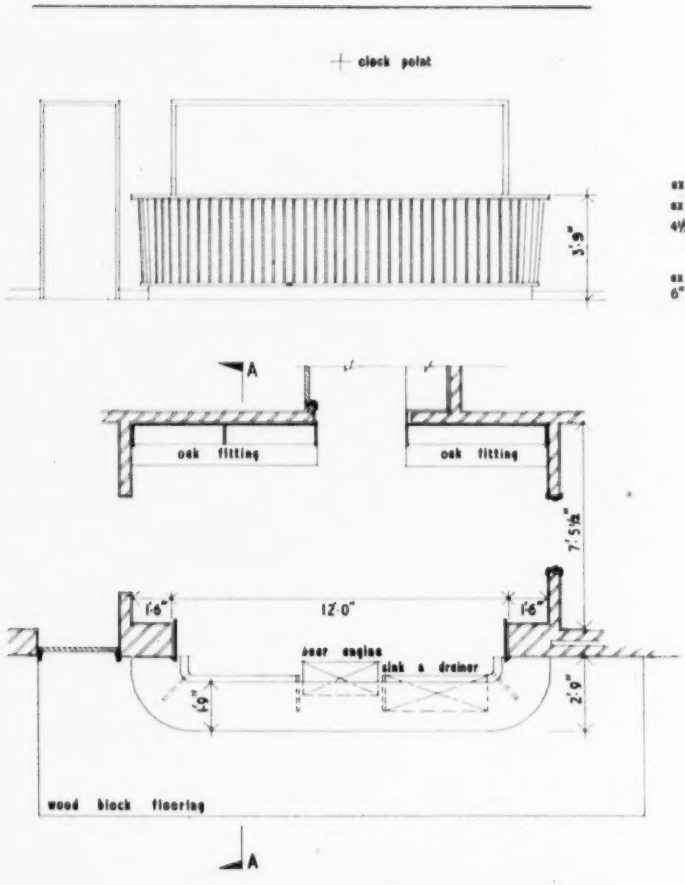


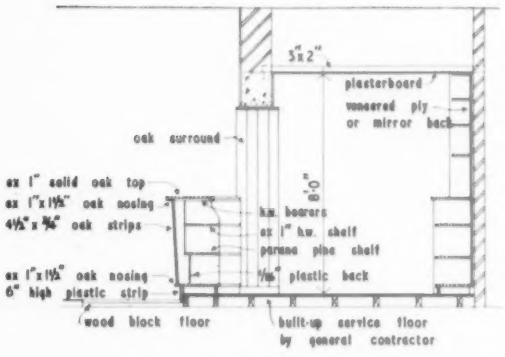
GROUND FLOOR





The public bar and details. Scale: ⅛in = 1ft





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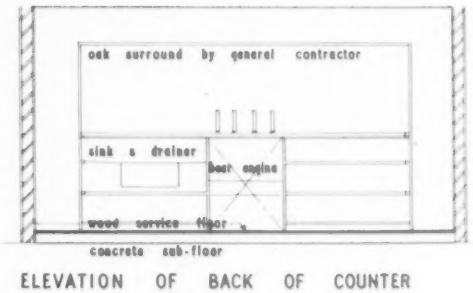


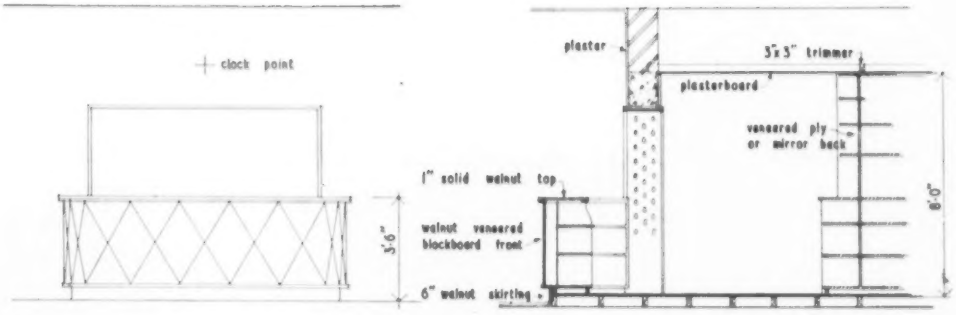
ELEVATION OF BACK OF COUNTER

Details of bar counter. Scale: 1in=6ft

PUBLIC HOUSE AT ADEYFIELD

The public bar

The lounge bar counter and details. Scale: 1in=6ft



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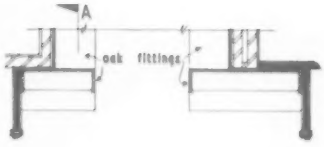
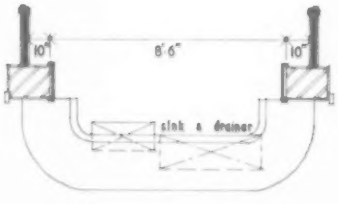
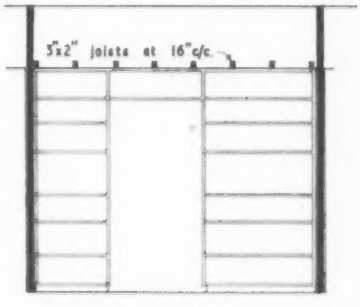






ELEVATION OF BACK FITTING

Accidents in the Home

THE publication recently of the report of the Standing Inter-departmental Committee on Accidents in the Home ("Accidents in the Home," H.M.S.O., price 6d) makes very sad reading, particularly as in 1951 there was a considerable increase in deaths from accidents of this nature over the previous years. Whilst much publicity is given to the very high death rate from road accidents it seems that the public is less conscious of the fact that there are a greater number of fatal accidents in the home than on the road, as the 1951 figures indicate 5,483 fatal home accidents compared with 4,698 fatal road accidents.

It would seem that architects and the building industry generally might be able to take some hand in reducing this appalling number of fatal accidents at home and also the enormous number of non-fatal accidents which cause heavy wastage of production, great stress and inconvenience to relatives and heavy expenditure at the hospitals. Unfortunately a very large proportion of the accidents in the home arise from causes which are outside the sphere of any actions which seem possible by the building industry. Nonetheless the Report indicates that of the deaths due to falls, which amount to 58 per cent of the total deaths, some 8 per cent were primarily due to faulty design, through factors such as the design of stairs, handrails, or the lack of them, single steps between the different floor levels and the positions of light switches on stairs and in passages. A further 20 per cent are due to poor maintenance in the home arising particularly from flooring, stair treads, hand rails and inadequate lighting.

It may be that the building industry could eliminate a considerable number of those accidents which are due to faulty design but it has very little opportunity to assist in the remedying of those cases where inadequate maintenance by landlords and occupiers is the contributory cause.

The Report makes clear that the majority of victims are young children and old people since more than 25 per cent are under the age of 15 and more than 50 per cent over the age of 65. Certainly improved planning and better building can do little to prevent foolishness and carelessness. No planning action can possibly offset the risks of accidents such as arise from seeking gas leaks with a naked flame. However, it is obvious that many home accidents could be avoided by the exercise of a little more care and forethought, especially if those responsible for the care of the old and young would bear in mind the inexperience of childhood and the disabilities of old age.

A recent Act of Parliament requires gas, electric and oil fires to be adequately guarded and it will, no doubt, have a considerable effect on the accidents which arise from these causes, and it must be borne in mind that burns and scalds account for a very large number of accidents in the home. It will, however, take many years before all the older appliances which are unguarded can be eliminated. On the other hand, precautions can be taken with most older appliances to make them reasonably safe if sufficient attention is drawn to the need for such action. In future it will be wise for those who specify gas, electric or oil heaters to make sure that they are properly guarded and that the guarding of the appliances ordered and supplied conforms to the test requirements in B.S.1945.

While this new Act does not concern itself with solid fuel appliances it is frequently not realized that there is a provision in the Children and Young Persons Act 1933 which requires those in charge of children under seven to take reasonable precautions against the risk of children being burned or scalded. Lately this provision has been amended by raising the age to 12. Many of the fire guards available on the market are not of types particularly suitable for the adequate protection of children and in addition those types which are suitable frequently are not secured to prevent them being pulled over, because suitable fixings are not available.

The greater use of closed and closable stoves should be a contribution to the reduction of accidents from burns and from flying sparks from fires, but they do not provide a complete protection. It would seem that the use of fully insulated solid fuel cookers should reduce considerably the risk of burns.

In regard to cookers a small factor in planning which can assist the reduction of accidents is to be sure that they are so placed that it is difficult accidentally to knock utensils off the tops due to handles projecting into passageways. Cookers which fit tightly into narrow recesses cause users to place saucepans on them with handles projecting into the circulation space of the kitchen.

A precaution which may be taken by architects to assist the reduction in accidents is to ensure adequate lighting particularly in corridors and on staircases. Corridors and heads of staircases lighted only from small fanlights over doorways remote from windows seldom provide sufficient daylight; adequate light is essential especially where there are changes of level which are similarly carpeted or otherwise covered continuously with dark materials. Staircase design can most certainly be the source of accidents. So frequently they are designed with inadequately sized treads, excessively high risers and odd steps, particularly at changes of direction. Flights of steps should never be less than three steps and, in spite of the additional cost involved, winders should be avoided but when used they are much safer if placed at the lower end of flights. The recommendations for staircases made in B.S. 585, although related primarily to stairs with close strings, are mostly equally applicable for other types. This B.S., however, does not require, as I feel it should, a continuous handrail at one side at least of every staircase. In addition much greater care should be taken to ensure that handrails are really securely fixed and those responsible for maintenance should, from time to time, examine these fixings, especially where there are old or infirm occupants of the building.

With regard to gas and electrical installations, if these are carried out in accordance with the various British Standard Codes of Practice there should be little risk of them being a source of accidents, except through sheer misuse and carelessness. The greatest risks are undoubtedly additions made by amateur electricians and the very wide use of multi-outlet adaptors because there are insufficient electrical outlets. The wide use of adaptors, so often in association with long trailing flexes, are very dangerous because the flexes are apt to trip occupants and also the insulation often becomes worn and causes shock prior to the blowing of fuses. It is undoubtedly false economy to provide inadequate electrical installations as these are a possible source of accident.

In regard to artificial lighting, careful placing of the source of illumination can contribute greatly to home safety. It is particularly undesirable that occupants stand in their own shadow when using cookers and similar appliances. For those who feel that there is a risk to young children by placing socket outlets near the floor, this risk can be overcome by the use of shuttered outlets complying with B.S. 1363 and B.S. 543. Very great care should be taken when making any electrical installation in bathrooms and as far as possible it is desirable that these should be eliminated.

The Report does not indicate whether fire is a very serious fatal risk in the home. It does, however, indicate that two important causes of fire, namely, children playing with matches and smoker's materials, are ones over which the building designer can have little control. However, the Building Byelaws and those connected with the design of buildings are undoubtedly treating fire risks as a subject of greater importance than in the past.

It will be noted from the Report that half the fires classified under "caused by electrical apparatus" have been attributed to cookers and most of those were due to carelessness or ignorance,

[Continued on page 105

The British Electrical Development Association

TESTING HOUSE, LEATHERHEAD, SURREY

Architects:
L. H. BUCKNELL,
RUTH ELLIS,
F.F.R.I.B.A.

THE work of this Laboratory is the testing of Electrical Equipment, principally domestic, but extends to small machine tools and laundry equipment. The domestic items vary from toasters, irons and blankets to such larger apparatus as cookers, refrigerators and washing machines.

Tests are principally for the safety and efficiency of Electrical appliances but a certain amount of development work will be undertaken.

The planning of the necessary Laboratory equipment is comparatively simple but a fairly extensive system of "Services" is involved.

The design and layout of equipment and services is the result of close collaboration between the Architects and the Manager of the Electrical Development Association Testing House, Mr. Richard Harvey.

The "Services," naturally, dictate the general plan since they are the core of the processes of test. In this instance they run centrally through the plan, in the corridor, with branches to the Laboratories and other workrooms.

The resultant plan is simple and direct and permits of easy extension laterally and vertically.

The more important details are outlined below.

Services

The general services are such as are common to most building and need no special mention. The special services are as follows:—

Electricity, alternating and direct current; gas, compressed air and water including high pressure.

The Electrical supply is taken at 415 volts from the South Eastern Electricity Board's sub-station which is incorporated in the building and adjoins a main switch room which contains the meters, battery charging plant, the control gear for the electrical heating system and the compressed air plant.

The pipe duct which contains the service mains is constructed with special metal brackets and is accessible throughout its whole length. It is divided into two parts. The upper one contains the electrical supplies, the alternating current being carried by copper bus-bars with porcelain insulators and the other supplies by cables in a pressed steel trough which forms the

The Portable Apparatus Laboratory

division of the duct. The lower part contains 1½in gas main, 1½in water and 1½in compressed air. Direct current which is required in some tests, is provided by a Battery Room containing a 300-volt 150 ampere-hour lead acid battery, and is fed into the pipe duct to serve all Laboratories.

Permanent openings are formed between the duct and the testing rooms so that connections can easily be made at any time. The electrical services are taken directly from the bus-bars through these openings and pass through "Distribution Fuse Boards" to the Laboratories via an "Exchange Panel."

This exchange panel, which is mounted in the Portable Apparatus Laboratory and adjoining the Battery Room is a device by which any voltage may be plugged into any room by means of inter-connectors.

The electrical installation throughout is in screwed conduit except in those places where the cables run through special cable ducts. The auxiliary heating, ring mains and lighting circuits are sunk below the surface but all special supplies to the test points are on surface work to allow flexibility for alterations and extensions.

Construction

The site slopes awkwardly down from the road level and since a level ground floor is essential for trolleys, a considerable amount of filling was necessary. To avoid this, a simple frame structure was considered, but the acute shortage of steel made its use impossible.

The structure is, therefore, one of simple load bearing walls, normal foundations and fire-resisting floors and roof.

The Hall and Staircase

Floors

The ground floor consists of 2in of 1:4:8 concrete binding on hard core, 6in of reinforced concrete, ¼in asphalte sandwich course, 3in of 1:4:8 concrete filling in which is embedded service pipes and conduits. On this filling is laid the heating coils which are covered by a cement screed and "Terradura" blocks, Quarry Tiles, Granolithic or Terrazzo. The total thickness of this floor is 14in.

The first floor is of hollow tile construction on which is laid 2½in of 1:4:8 concrete fill. This contains the electric conduits serving the ground floor lighting, some of the ring mains and the first floor heating and ring mains, and on it is laid the coils of the first floor heating.

The heating coils are protected by 1in cement screed and on this is laid the floor finish—Terradura, Quarries or Terrazzo. The total thickness is from 9½in to 13½in depending upon the span of the structural floor.

The roofs also are of hollow tile but covered with 3in of Vermiculite to conserve heat; above this is a cement screed laid to falls to take 3-ply bituminous felt on the ground floor roof and ¼in asphalte on the first floor roof.

Vermiculite is also used in the form of plaster on the internal surfaces of all external walls to conserve heat.

The site is exposed to driving rain from the S.W., and the external walls so exposed are built in two skins; the inner 9in skin is covered with pitch brushed in, the outer skin is 4½in and the two skins are bonded together with expanded metal every sixth course of bricks.

The X-Ray Room

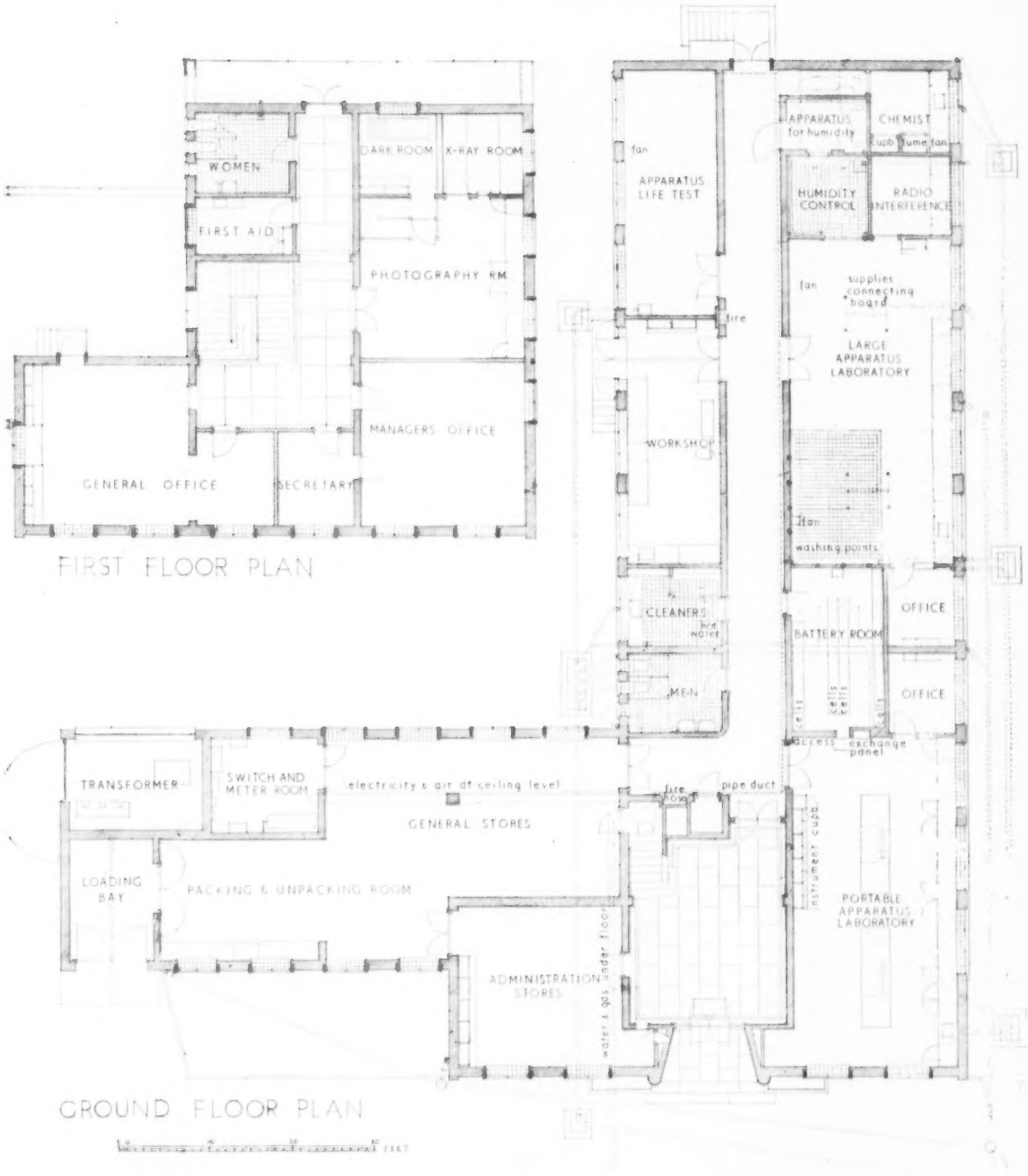
Certain tests involve the use of X-ray apparatus. For example, the photographing of heater wires in a solid object, the determination of the exact position of thermostats in electric blankets, etc. This avoids dismantling, which would otherwise be necessary.

The whole of the X-ray tube is contained within a swivel head so that the X-rays can be directed downwards or horizontally. Photographs can be taken of an object resting on a table or on the floor. When it is desired to ascertain only the position of some parts of the object under inspection, it can be suspended in front of a fluorescent screen and examined through the lead glass window.

Provision is made for moving the position of the appliance from the outside of the room to obviate the necessity of shutting off the plant and entering the room.

The room is completely insulated against the harmful rays.

One wall is of 9in concrete which gives sufficient protection. The other is plastered on both sides with barium plaster, the hollow tile floor is covered with 3in of barium concrete and the area immediately under the X-ray apparatus is covered with 6 lb lead



below the floor surface. The solid flush veneered door has a core of 6 lb lead and the wood jambs of the door are covered with lead to obtain continuity with the barium plaster. The glass in the door and the observation window is X-ray glass and is equal in resistance to 6 lb lead.

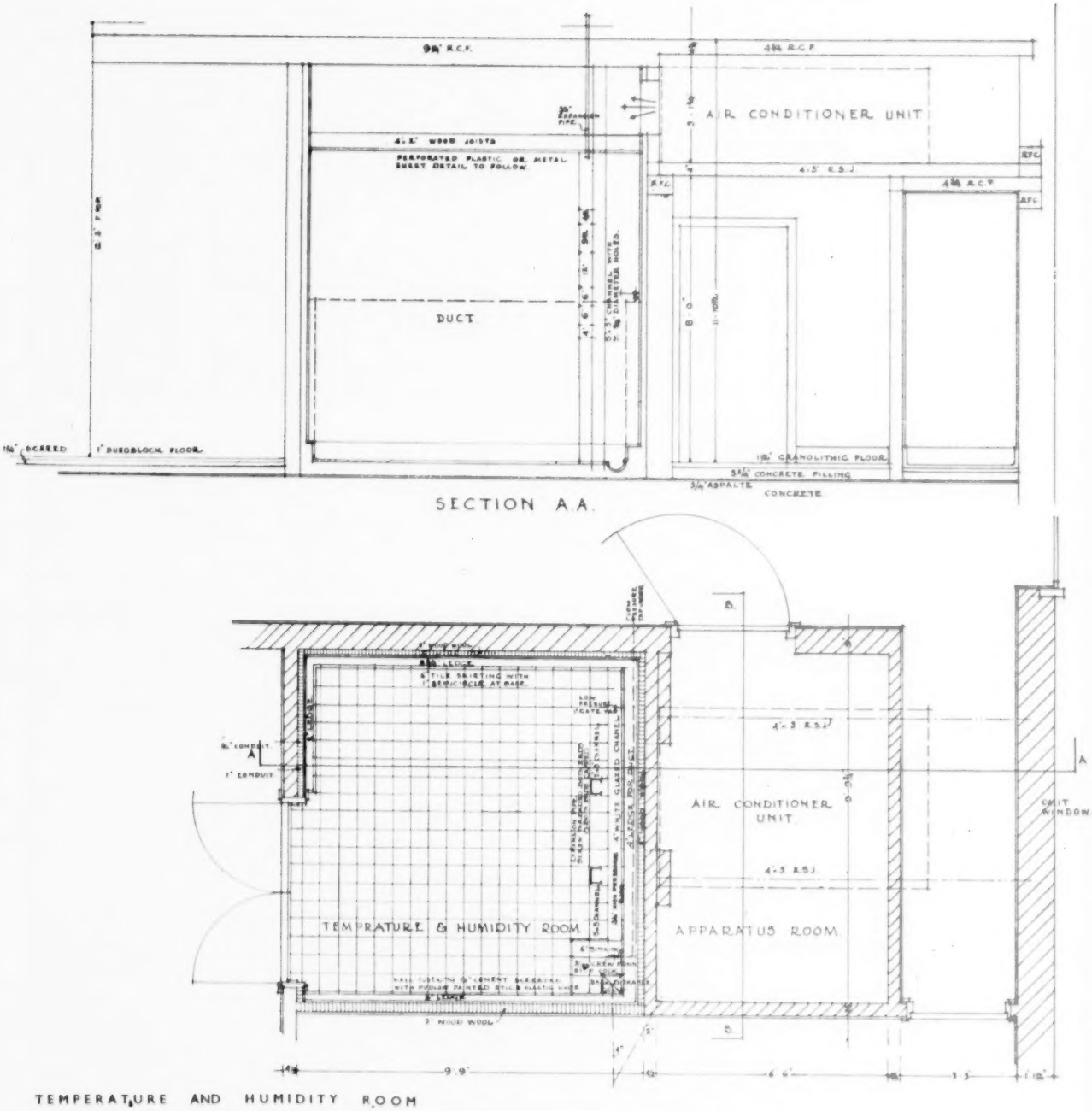
Radio Interference

Certain electrical appliances give rise to electro-magnetic disturbance and if this is excessive, have to be fitted with suppressors to avoid annoyance to radio listeners.

The extent of this interference is measured and specifications are prepared to give permissible limits of such interference.

To enable such tests to be made, the laboratory must be completely free from external influence and this is achieved by what is in effect a continuous perforated metal cage.

The walls and ceiling are lined under the plaster with ½in mesh 21 S.W.G. copper as also is the floor under the cement screed. An inner "window" is provided covered with similar copper mesh and the door has a core of the same material. The jambs and edges of the door are similarly covered and the edges of the mesh protected by copper



TEMPERATURE AND HUMIDITY ROOM

strips so that complete continuity is preserved. Under the door and let into the floor is a spring contact strip which is rather like a continuous "sunk floor door stop."

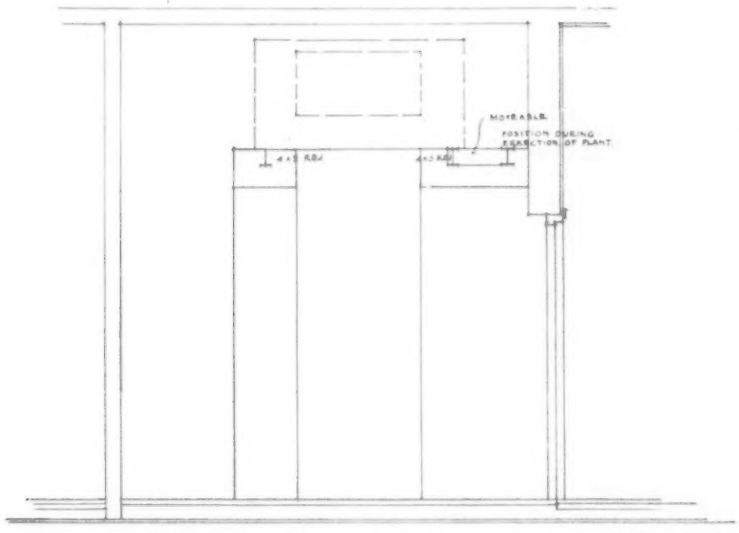
Controlled Temperature and Humidity

Some electrical appliances, such as water heaters and some thermal storage space heaters depend for efficiency upon maintaining the temperature of some interior part at a high value and any heat lost through the walls or casing of the appliance reduces its efficiency. Other appliances such as drying cabinets, are affected by humidity as also is the insulation resistance of some of the more hygroscopic materials.

A laboratory is provided to carry out tests in these conditions. The walls are lined with 2in of wood wool covered with waterproof plaster and painted with waterproof paint. The air-control plant is fixed at a high level and the air is delivered to the room through a perforated metal ceiling suspended from the main ceiling. The air circulates through the room and is extracted through ducts in the lower part of the walls. This is a "wet" room and the floor is impervious and floor channels drain into the general drainage system.

Heating

The heating of the building is *electric floor heating* by means of a grid contained in the concrete filling above the structural part of the floor. This grid covers nearly the whole floor area of rooms and passages and is formed of cables spaced three to six inches apart. These cables consist of a core of resistance wire surrounded by a refractory insulating medium and an outer sheath of copper, the total diameter being about $\frac{1}{4}$ inch.



SECTION B-B

The installation is planned on an experimental basis with a view to determining under controlled conditions the effect of such factors as depth below surface, floor finish, etc.

In some rooms, special meter plates are embedded in the floors to allow of the measurement of heat flow upwards and downwards.

Each grid is controlled by a thermostat so that the floor temperature can be adjusted and the effect of floor surface temperature upon comfort conditions be determined.

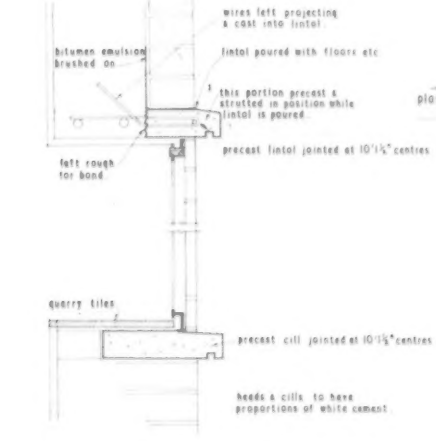
The temperature at floor level is such as to preclude the use of some of the normal types of floor finish, also any fixings to the floor such as holding down bolts must be predetermined, i.e., the floor cannot be hacked up for such fixings after the heating grid is laid.

From the architect's point of view this method of heating is attractive on account of its cleanliness and freedom from obstructions.

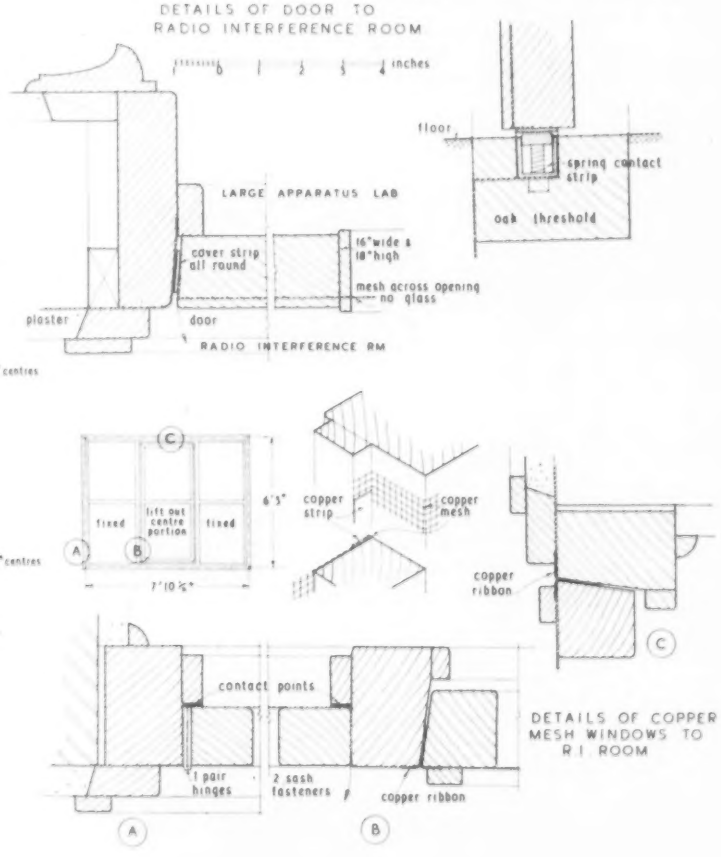
QUANTITY SURVEYORS: MESSRS. WIDNELL & TROLLOPE

BUILDERS: MESSRS. PRESTIGE & CO., LTD.

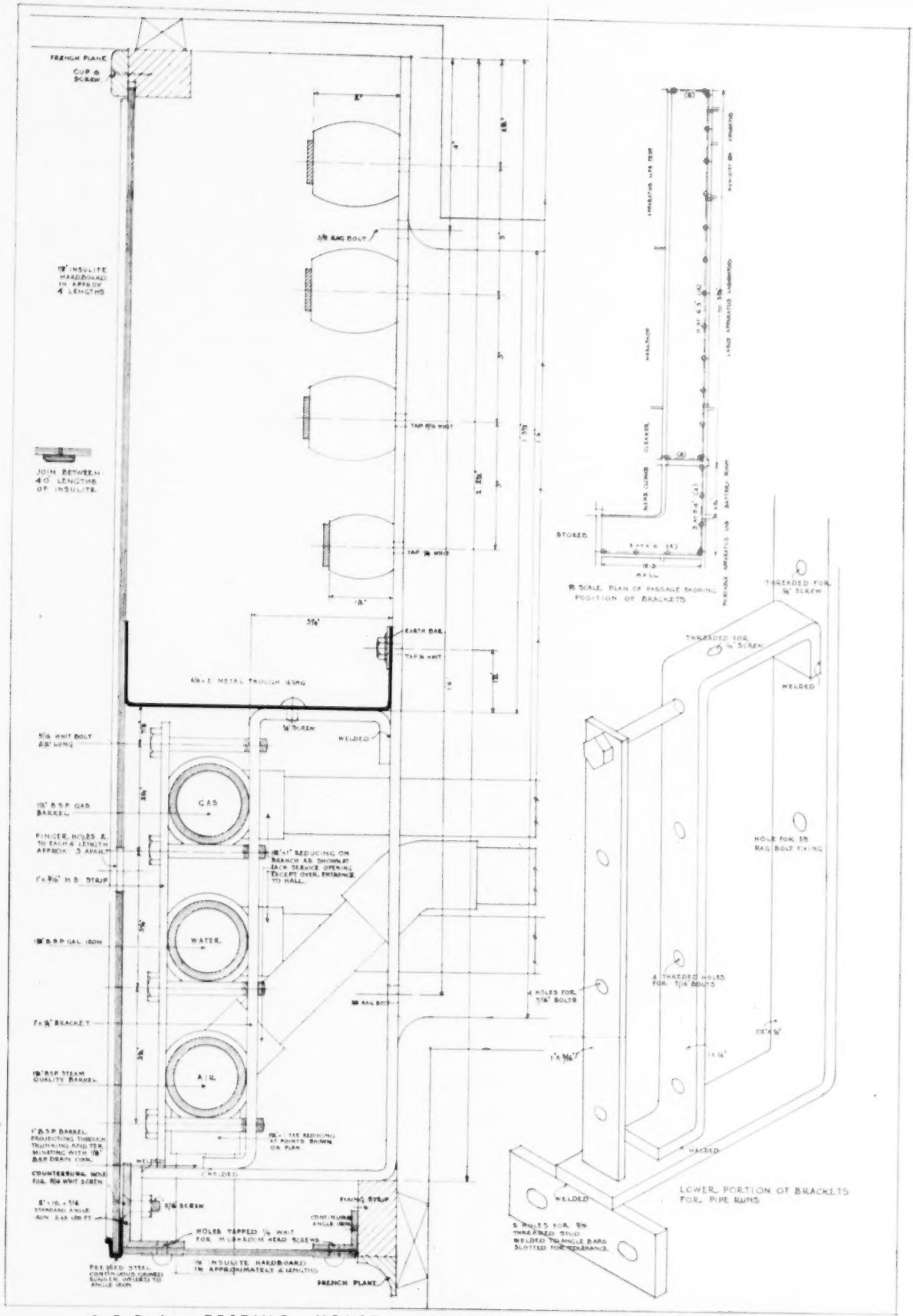
Acoustic Work: Gyproc Products, Ltd. *Air Conditioning Plant:* Air Control Installations, Ltd. *Asphalt:* Limmer & Trinidad Lake Asphalt Co., Ltd. *Bitumastic Felt:* D. Anderson & Sons, Ltd. *Blinds (Dark Room):* Avery (Est. 1834), Ltd. *Bricks:* The Keymer Sand Faced Brick & Tile Co., Ltd. *Disc:* Arthur J. J. Ayres, F.R.B.S. *Doors & Special Woods:* Wm. Mallinson & Sons, Ltd. *Electric Light Fittings:* Benjamin Electric, Ltd.; Crompton Parkinson, Ltd.; R. & A. G. Crossland; General Electric Co., Ltd.; Merchant Adventurers, Ltd.; Philips Electrical, Ltd.; Troughton & Young, Ltd. *Fans:* Vent-Axia, Ltd. *Floors:* The Terradura Flooring Co., Ltd.; Diespeker Co., Ltd. (Hollow Tile). *Gas Services:* Richard J. Audrey, Ltd. *Granitex:* S. Towers & Son, Ltd. *Handrails & Guard Rails:* Dryad Metal Works, Ltd. *Hoists:* G. Brady & Co., Ltd. *Ironmongery:* N. F. Ramsay & Co., Ltd. *Mast:* J. W. Gray & Son, Ltd. *Metal Doors:* Haywards, Ltd.; C. E. Welstead, Ltd. *Metal Gates and Screen:* William Hayward & Sons, Ltd. *Metal Windows:* C. E. Welstead, Ltd. *Paint & Distemper:* Leyland Paint & Varnish Co., Ltd.; Silexine Paints, Ltd. *Partitions:* Supalith, Ltd.; Venesta, Ltd. (W.C.). *Pipe Line Brackets:* Light Steelwork, Ltd. *Rain Water Goods:* Henry Hope & Sons, Ltd. *Reinforcement:* Expanded Metal Co., Ltd. *Sanitary Fittings:* W. N. Froy & Sons, Ltd. *Slotted Inserts:* Huntley & Sparks, Ltd. *Terrazzo:* Art Pavements & Decorations, Ltd. *Ventilating Louvres:* G. A. Harvey & Co., Ltd. *Vermiculite:* Vermiculite (London), Ltd. *X-Ray Glass:* Cuthbert Andrews.


wires left projecting & cast into lintel
bitumen emulsion brushed on
lintel poured with floors etc
this portion precast & strutted in position while lintel is poured
left rough for bond
precast lintel jointed at 10'1½" centres
quarry tiles
precast cill jointed at 10'1½" centres
heads & cills to have proportions of white cement

WINDOWS TYPE A. EAST-WEST ELEVATION



DETAILS OF COPPER MESH WINDOWS TO R.I. ROOM


FRENCH PLANE
CUP & SCREW
18" INSULITE HARDBOARD IN APPROX 4 LENGTHS
JOIN BETWEEN 4'0" LENGTHS OF INSULITE
3/8 RAG BOLT
TAP 5/16 WHIT
TAP 3/8 WHIT
EARTH BAR
TAP 3/8 WHIT
60 x 5 METAL TROUGH 6'6" LONG
5/16 SCREW
WELDED
5/16 WHIT BOLT 2½" LONG
GAS
WATER
AIR
18" B.S.P. GAS BARREL
FINGER HOLES & TO EACH 4' LENGTH APPROX. 3 APART
1" x 5/16" M.S. STRIP
18" B.S.P. GAL. IRON
FA¾" BRACKET
18" B.S.P. STEAM QUALITY BARREL
1" B.S.P. BARREL PROJECTING THROUGH TRUNKING AND TERMINATING WITH 1/8" B.S.P. DRAIN COCK
COUNTERSUNK HOLE FOR 5/16 WHIT SCREW
2" x 2" x 5/16" STANDARD ANGLE MIN. 5.65 LBS PER FT.
5/16 SCREW
HOLES TAPPED ¼ WHIT FOR MUSHROOM HEAD SCREWS
PRESSED STEEL CONTINUOUS CHANNEL RUNNER WELDED TO ANGLE IRON
18" INSULITE HARDBOARD IN APPROXIMATELY 6' LENGTHS
FRENCH PLANE
FIXING STRIP
CONTINUOUS ANGLE IRON
1" x 1" TEE REDUCING AT POINTS SHOWN ON PLAN
18" x 1" REDUCING ON BRANCH AS SHOWN AT EACH SERVICE OPENING EXCEPT OVER ENTRANCE TO HALL.
STORED
MAIN
½ SCALE PLAN OF PASSAGE SHOWING POSITION OF BRACKETS
THREADED FOR ¾" SCREW
THREADED FOR ¾" SCREW
WELDED
HOLE FOR 3/8 RAG BOLT FIXING
4 THREADED HOLES FOR 5/16 BOLTS
4 HOLES FOR 5/16" BOLTS
1" x 5/16"
WELDED
WELDED
6 HOLES FOR ⅜ THREADED STUD WELDED TO ANGLE BARS SLOTTED FOR TOLERANCE
LOWER PORTION OF BRACKETS FOR PIPE RUNS

B.E.D.A. TESTING HOUSE. DETAIL OF PIPE LINE BRACKETS

ACCIDENTS IN THE HOME

Continued from page 98]

while the figures given for the accidents of fires caused by radio and television sets seems surprisingly large but again there seems little that the building industry can do to help.

Flooring materials are undoubtedly the cause of many falls. Frequently it would appear, these are due either to faulty maintenance or because they are too highly polished and small rugs slip on them. To find the ideal flooring material which is easy to maintain, both with regard to cleanliness and appearance, but at the same time is non-slip, is by no means easy, especially at a low cost.

Another known source of accidents in the home arises from slipping in baths, especially when older people are trying to get out of the bath. The cost of an adequately fixed hand-grip is small and seems worthwhile.

The Report points out that B.S.I. has taken steps in some domestic spheres which should help to reduce accidents if products complying with these standards can be put into general use. British Standards are available for pressure cookers, step-ladders and a very considerable number of domestic appliances both fixed and movable. The Report, however, points out that the wider use of these standards would be helpful although compliance with them cannot be made compulsory. However, even if articles such as step-ladders or pressure cookers are made in accordance with a British Standard, if they are not adequately maintained by the user they will, in time, become potential accident risks. It seems, therefore, that to eliminate the bulk of causes of accidents in the home it is necessary to make householders and their families conscious of the causes of risks in the hope that they will avoid doing foolish things.

DUTCH UNCLE

A PORTABLE ALUMINIUM MAST

THE system of wireless transmission at very high frequencies is now being used on an increasing scale for television and telephone links. Establishment of a new line has to be preceded by tests to discover the best site for each relay station and the height of mast that will be needed, and for this work pairs of temporary test masts, carrying transmitting and receiving equipment, are employed. Structurally, these test masts must be easily transportable to the sites over all types of country and capable of being quickly erected and dismantled by a small crew. A further essential is that the height of the directional transmitting and receiving aerials and reflectors on the masts should be readily adjustable.

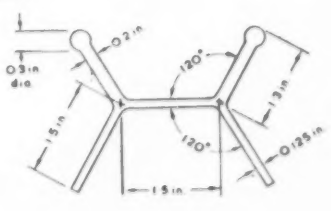
A pair of 200ft-high test masts to meet these requirements has recently been built for Standard Telecommunication Laboratories, Ltd., by Painter Brothers, Ltd., Hereford, to the design of British Insulated Callender's Construction Company, Ltd. The material chosen for the structure was the aluminium alloy Noral 51SWP, supplied by Northern Aluminium Company, Ltd. Each length of mast, 8ft 4in long, weighs only 110 lb and is easily handled by two men aloft with the aid of a light-alloy erection pole. Bolted construction was chosen so as to enable the individual lengths to be further broken down to any degree necessary for shipment over long distances. In general, the bolts are of Noral 51SWP alloy, like the members, but high-tensile steel is used for the bolts that connect each length to the next. Mild steel is used for various details at the butt joints and at guying points. All steel parts are galvanized to prevent atmospheric corrosion and to avoid any possibility of galvanic interaction with the aluminium.

A 200ft-high test mast recently built for Standard Telecommunication Laboratories Ltd. by Painter Bros. Ltd. to the design of British Insulated Callender's Construction Co. Ltd.

A special section was designed for the main leg members, which assist in guiding the test equipment up and down the mast. The readiness with which complex, multi-purpose sections can be produced by extrusion is, of course, one of the advantages of aluminium as a structural material.

At the butt joints between the lengths of mast the connections are made through welded-steel fittings on each leg. Guys are attached to welded-steel lugs fastened to the outside of the legs by two ½in dia M.S. bolts. The bolts pass through a steel reinforcing plate shaped to fit inside the leg section.

One 200ft mast, complete with steel head and base plates, wire ropes and fittings but excluding anchorage pickets, weighs just over one and a half tons.



HEALTH CENTRE SIGHTHILL EDINBURGH designed by the Architects of the Department of Health for Scotland

THE building is planned in the form of a hollow square round a central garden courtyard. On the west, south and east of the courtyard are single-storey wings and on the north side is a wing of basement and two storeys.

The general practitioners' wing contains six similar suites, each of waiting-room, consulting room and examination room. These suites are self-contained and have a small private lobby.

The local authority wing provides for the child welfare service a waiting-room, baby weighing-room, changing room and consulting rooms, and for the school health service a waiting-room, treatment room and consulting room. This wing has a separate entrance with covered parking space for perambulators. It also includes a lecture room, with a demonstration kitchen, a playroom for toddlers, an enquiry office and a distribution counter for health foods.

Situated between the general practitioners' wing and the local authority wing is a joint services wing which will provide X-ray facilities, sterilizing and dressing rooms, a laboratory and a physiotherapists' suite with gymnasium for remedial exercises.

The dental wing which is situated on the first floor contains four surgeries, two of which will be operated by the local authority. One of the local authority surgeries will be equipped for treatment of children. There are three waiting-rooms and a recovery room, also a dental workshop and a dental X-ray and dark room.

The administration wing contains offices, including a general office and interview room to be used by the district nurses. It also contains classrooms and studies. In addition there are staff rooms and a kitchen. The basement provides storage space and service rooms.

The total floor area of the building is in the neighbourhood of 35,000 square feet.

Construction

The single-storey wings are built with solid concrete floors with 7in × 7in reinforced concrete pillars at 4ft 9in centres supporting a reinforced concrete eaves beam. The roof which is supported on a cold rolled steel framework is of reinforced Gypklith covered with sheet copper. The framework spans between the eaves beams and is not supported by the internal partitions. The wall cladding is of cavity construction, the outer skin being of 4½in Dunbrick facing bricks, the inner skin 4in foamed slag concrete blocks. On the first floor the walls are of 11in cavity brick roughcast on the outside and lined with 2in foamed slag concrete blocks. The internal partitions are of foamed slag concrete. The basement walls are of 7in reinforced concrete with a damp-proof membrane and a lining of 3in foamed slag blocks. Above ground level this wall is faced on the outside with concrete facing slabs, acid washed to expose the aggregate. The internal partitions are of foamed slag concrete blocks. In the case of rooms where privacy is of particular importance a double partition of 2½in blocks with a 2in cavity is used to provide better sound insulation. Window frames are of steel. Window sills are of slate. Some rubble free stone load carrying walls are incorporated in the design to provide a contrasting texture to the brick and roughcast finishes.

Heating System

The building is heated by electrical floor and wall panels operated from the "off peak" electrical supply. Electrical cables are run in conduit which has been built in to the floor screed and the wall partitions. Each circuit is controlled by a thermostat which operates according to the air temperature of the room in which it is situated. Wall panels are backed by heat reflecting material. The heat which is built up during the "off peak" hours is contained in the fabric of the building during the remainder of the day. A boost to the heating is obtained in the middle of each day.

Services

Hot water is supplied through electric calorifiers operated from the "off peak" electrical supply. The sterilizing equipment is similarly operated. Hot, cold and main water, gas and compressed air are circulated to rooms as required. Electric power is supplied through ring mains to 13 ampere sockets. The mains are run in ducts in the external walls with access boxes in each window bay. This allows some flexibility in the position of the socket outlets.

Finishings

The internal wall finish is plaster. Suspended ceilings are for the most part covered in insulation board cut in square panels. Some ceilings are finished in plaster and some in acoustic plaster. A variety of floor finishes has been used as the building is of an experimental nature. The floor finishes include wood block, cork tile, thermoplastic tile, linoleum in sheet and tile form, Fleximer flooring, mastic asphalt and terrazzo. The links and entrance hall are floored in slabs of Caithness stone. Internal wood finishes include mahogany and softwood skirtings and surrounds. Flush doors are veneered in mahogany and poplar. The external wood cladding on the bay windows is of Afrormosia, a West African wood similar to teak.

Furnishing and Decoration

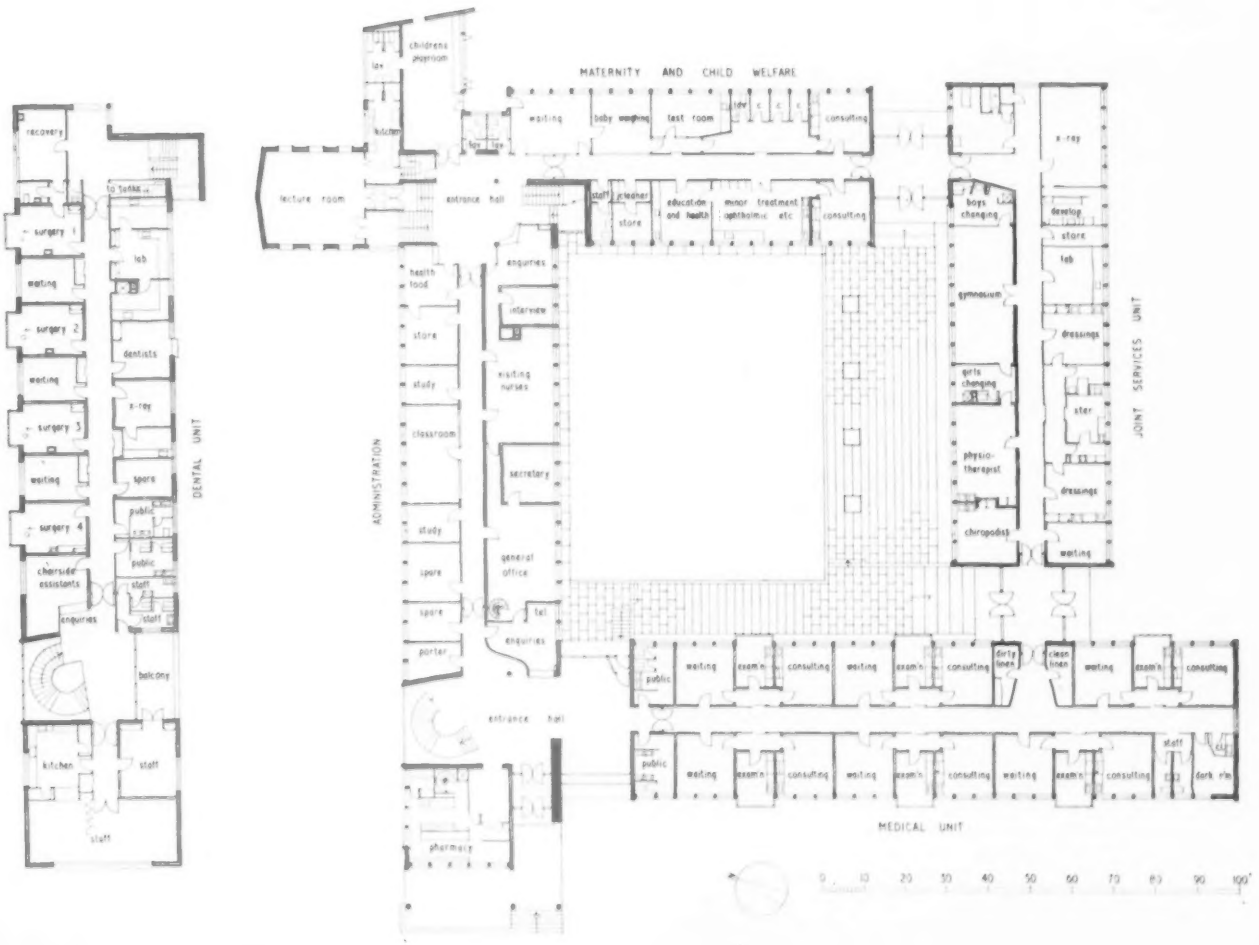
An attempt has been made to create a fresh and non-institutional atmosphere by the use of bright colours in paint, wallpaper and floor coverings. Curtains in non-clinical rooms are for the most part of printed fabrics. The furniture has been kept as light as is possible consistent with the wear and tear to which it will be subjected.

Garden

The garden, which is unfenced, has been laid out with lawns and flowering shrubs to give a pleasant setting for the building and to reduce maintenance to a minimum. In the courtyard there are three mature silver birch trees which were transplanted from the grounds of a hospital twenty miles distant.

ARCHITECTS : The Architects of the Department of Health for Scotland. ROBERT GARDNER-MEDWIN, lately Chief Architect. ROBERT MORTON, Deputy Chief Architect for special buildings. JOHN OGILVIE and GEORGE LAWRENCE, Senior Architects responsible for development of design and supervision. ERIC HALL, Assistant Architect. R. J. WALKER, D. A. MacGilivray, R. E. A. Eadie, Assistants. Clerk of Works : R. HARKESS. Consultant Structural Engineer : W. A. FAIRHURST, M.I. Struct.E. of F. A. Macdonald & Partners. Consultant Heating Engineer : Messrs. OSCAR GABER & PARTNERS. Consultant Quantity Surveyor : P. W. DIXON, M.B.E., A.R.I.C.S., of Messrs. JAMES D. GIBSON & SIMPSON.

Excavation & Reinforced Concrete Work : Fram Reinforced Concrete Co. (Scotland), Ltd. *Asphalt Work :* Neuchatel Asphalte Co., Ltd. *Blacksmith Work :* James Blake & Co., Thomas Hadden. *Carpentry and Joinery :* Nathaniel Grieve. *Cooper Roofing :* Fredk. Braby & Co., Ltd. *Cork Floors :* Armstrong Cork Co., Ltd. *Damp Courses :* Wm. Briggs & Sons, Ltd. *Electrical Installation :* Drake & Gorham, Ltd. *Electrical Floor Heating :* Electric Panels, Ltd. *Furniture :* S. Hille & Co., Ltd., Geo. M. Hammer & Co., Ltd., Ernest Race, Ltd., Russell Furnishings, Ltd., Rowan & Bowdon, Ltd., Scottish Co-operative Wholesale Society, Ltd. *Glazing :* James Thow, Ltd. *Garden Work :* Young & Thomson. *Lathing for Suspended Ceilings :* W. H. Colt (London), Ltd. *Linoleum :* Korkoid Decorative Floors. *Masonry and Brickwork :* John Martin & Co., Ltd. *Metal Windows :* Williams & Williams, Ltd. *Painting :* T. W. Scott. *Plastering :* D. & J. Borthwick. *Plumbing :* Wm. Barton & Sons, Ltd. *Precast Concrete Work and Facing Slabs :* Edinburgh Cast Stone Co. *Reinforced Gypklith :* Gyproc Products, Ltd. *Roads and Paths :* H. V. Smith. *Roof Steelwork :* Ayrshire Dockyard Co., Ltd. *Steel Erection :* M. Barr. *Soft Furnishings :* Martin & Son (Edinburgh), Ltd. *Terrazzi :* Toffolo Jackson & Co. *Thermoplastic Tiles and Cement Rubber Latex Flooring :* Semtex, Ltd. *Water Tank :* Braithwaite & Co. Structural, Ltd. *Wood Block Flooring :* A. M. Macdougal & Son, Ltd.



Modern Architecture

AN EXCHANGE OF SHOTS BETWEEN "CAVALIER" AND "ROUNDHEAD"

The Case Against

LET us consider "Modern" architecture. The word modern gives it the appeal; if it were known as "Continental Concrete Style" its success might have been less spectacular. The efforts to prove that the modern style really has its roots in England is clearly a case of "who excuses, accuses." Rather than admit it is an imported, exotic mannerism, its defenders go to great lengths to father the style on late Victorian architects who, if they were alive to-day, would have rejected it as unsuitable to this climate and repudiated all responsibility for it. Who would own up to having introduced rabbits into Australia?

But just as the Russians claim that every major invention was the discovery of a Russian, so the modern architect claims that Charles Rennie McIntosh, or Walton, or whoever it is, planted the acorn that has produced not a true English oak, but a monstrous concrete growth alien alike to our tradition and our countryside.

The modernists have for some time been floundering in the problems that have arisen in trying to work against the grain. Too late they have started to examine their grandfathers' traditional building forms to discover by what strange and unfair methods their predecessors put up buildings that have improved and mellowed with age and have defied the British climate in its ceaseless attempts to disintegrate them. There is a furtive seeking for a way back, in the direction of eyebrows and overhangs; pitched roofs have quietly been put back in the hope that no one noticed they had ever not been there.

Many good architects like Mr. Gibberd and Messrs. Taylor and Green, have tried the Continental idiom only long enough to satisfy themselves that it was not right over here, and have returned refreshed from the experience to their native tradition. Heed them.

Temporary as it is—the Modern experiment has been the true architectural adventure of the first half of this century, it can be pardoned as a youthful example of *goût étrangere*, as one forgives the British girls who gave their hearts to romantic foreign servicemen during the war and for the same reason "it (or he), was different." If I am wrong, the post-war years should have shown a different standard of modern building and design, the pre-war faults should have been analysed and eliminated. The old unsuitable materials that stayed fresh only long enough for the architectural photographer to expose his plates, have continued to deface the country. They are unable to respond to the changes of light and atmosphere that characterize our weather, and which play over the surfaces of our traditional buildings, giving them a hundred different aspects, all beautiful. One reason that this deplorable style was able to insinuate itself among us was by its uniqueness. We were vouchsafed one building at a time, often seen as a clean, sane-looking block against a confused dark background of muddled buildings.

Put a lot of these concrete cubes together and the boot is on the other foot! One flat-roofed cubic villa on the cliffs has some, but not much, of the attraction of a coast-guard post or something of that sort. Scatter half-a-dozen about and the effect is catastrophic. They refuse to blend with their natural surroundings, and attempts to quieten them down with coats of colour wash only result in shabbiness and high maintenance costs. No one sits out on the flat roofs (except seagulls), which become cluttered with aerials and top-hamper that the designer forgot about at the drawing-board stage.

The word "functional" has not yet been mentioned. This is the second line of defence. Traditional architecture does not work. It is like the stage-coach, all right in its day, but to-day is no longer its day. The aeroplane and motor car, we are told, will feel uncomfortable if buildings lag behind. So the growth of architecture, previously slow but sure, is speeded up leaving in its wake, puzzled clients, disgruntled contractors and designers frantically trying to keep up with the advance guard!

Commodity, Firmness and Delight are replaced by functionalism, infirmness and fashion.

What is the truth about this argument? Quite the contrary to what its advocates say. It is precisely the people who drive cars and pilot aeroplanes who gravitate towards the old Tudor pubs when they step out of the machines. They have all the function they require in these machines, and in their factories and laboratories.

Architecture, in their minds represents the roots and machines the branches. They do not want everything round them to be strange, new and changing. They continue to cling to the traditions that the modern architect has told them are dead, false, unfunctional and—dirty word—unfashionable.

How often have we been told that the garden spade, scythe or cricket bat expresses fitness-for-purpose in the course of an argument to prove that the equivalent to these things in building is the "modern" style. The argument would have force if used to prove just the opposite. If you know anyone who talks like this send him for Christmas an aluminium cricket bat or a plastic garden spade.

What other advantages has the modern style? Oh yes, it leaves the planner free. Well it does, and I will grant that the rules and convention of classic architecture grew into a planners strait-jacket. But this very Classic style was, like the modern, an import from Italy. Our previous vernacular was more organic and more appropriate to our weather and natural resources. The classic style has never been completely absorbed and was only understood and appreciated by a small proportion of the population. The Universities with their emphasis on Greek and Latin culture, provided architects with clients who understood what they were driving at. To-day the scientist and engineer do not read the books of Le Corbusier and Gropius, and there is no sympathetic relationship between them and the modern architect.

Lastly, the most serious criticism of the Concrete Continental Style is that it has cut off architects from craftsmanship. More and more time is spent on drawings and directions to get out of unsympathetic builders and workmen what the designer intends. Instead of a monolithic industry, there is a layer cake. The labour side cannot make head or tail of the architects' design and has no respect for him as, for instance, the craftsman who served Sir Edwin Lutyens and his generation had in their day.

It is not so in other industries. The electrical engineer or the flight mechanic prides himself on keeping up with developments. But try asking a bricklayer's mate if he agrees that Le Corbusier should have the Royal Gold Medal!

If we can now agree to call it a day, it is still possible to rebuild the industry in such a way that from the top to the

bottom we all speak the same language. The operative should know why things are done as they are, and should be responsible for his part in a building, knowing that the architect has his work cut out without standing over concretor, electrician and plumber with copies of B.S.S. in his hand.

If our native tradition, and consequently the industries founded on it decay, it will be a painful process trying to create buildings of any quality by synthetic methods. Architecture is the escape from the machine.

CAVALIER

The Case for the Defence

UNTIL I read "Cavalier's" article, I had forgotten that such people existed. It is all emotion, and I hardly know where to begin educating him. Has Cavalier ever asked himself why traditional architecture, if it was so stable, failed to survive? Anyone would think that there were no old-fashioned buildings, when in fact they are the rule and modern is the exception. It is the Royal Academy versus Picasso over again. The jealousy of the outmoded academic designer for the attention that is being paid to his rival. Why are people stimulated by the work of Picasso and Le Corbusier, while being bored with or indifferent to the academicians or Cavaliers? Because one is *dead* and the other *alive*.

There are some people who never understand this distinction in the arts and can only live in a trance of ancestor worship.

The modern architect is able to offer a score of books patiently, logically and good temperedly making out the case for the modern style. The fittest to survive will survive, my poor Cavalier, whatever you may say. Your airmen and motorists who escape from their machines into the cosiness of the Tudor pub are by no means anti-modern. More and more young people are interested and stimulated by modern architecture, modern paintings, music, furniture and fabrics and will become to the modern designer what your classical graduates were to their architects, only they will be less patronizing.

The points that Cavalier makes, such as weathering are regarded as a challenge which is being met, and which will carry the modern style forward, possibly even to a point where its critics can appreciate it. If I understand Cavalier he would return like Augustus Welby Pugin to the Golden Age before the Renaissance. Does he really believe half-timbered buildings kept out the draughts and the rain, or were warm and well lit? Anyway, there are still a lot about where he can bump his head, fall downstairs, crouch over a smoky fire and keep awake listening to birds and animals in the thatch!

It is the so-called traditionalists who have let their side down. Their tasteless variations over the last 100 years convinced the best minds in the architectural profession of the need to think things out from scratch.

The fact that Professor Gropius is German and M. Le Corbusier Swiss no more invalidates their ideas than if they were British. It is for us to make such adjustments as experience dictates. If British engineers had been more aware of the work of Maillart, it would have been better and not worse for us, "We are part of the Main."

The traditionalist, rather than change course to meet the economic wind, prefers to undergo a form of striptease. One by one his precious mouldings, ornaments and fruit, are dispensed with, and we are presented with great gaunt blocks of brick work with here and there a pedimented window or tacked-on hundredweight or two of symbolic sculpture. A teaspoonful of Wren in a quart of water.

This poor-but-honest solution is based on the extraordinary idea that present unfavourable conditions are a passing phase and that one day the grandeur that was Blom and the glory that was Lut, will return, and these faithful buildings which have kept the flag flying through the dark age will be canonized for keeping the torch flickering but not quite extinguished. What (as Cavalier would say) is the truth? It is that these boring, empty and negative buildings (which Mr. J. M. Richards has had the courage to criticize) have brought about complete lack of interest in the public. In Russia they have understood this. Architects in the U.S.S.R. have been driven mercilessly by their masters to produce designs rich and ornate to the point of surfeit, the *ne plus ultra* of popular expression, and traditional at that. Would Cavalier advocate a British version of Soviet luxuriance?

Modern architects are not unaware of the qualities of traditional materials or indifferent to the splendid colour and texture of stone, brick and tile or slate.

They simply refuse to pretend that the present is the past or that economic conditions that made them possible operate with equal force in the nineteen fifties.

If the building industry is confused by the different trends and conflicting opinions, it must feel its own way towards survival. I will admit that modern architecture would be better served by contractors and operatives who understood it and specialized exclusively in its technique, but are there not firms who are growing up with it, with directors who can follow arguments and appreciate what the architect is trying to do? Of course there are, and the emphasis will gradually shift in the direction of 20th-century architecture and away from the *réchauffé* style that Cavalier is so anxious to keep alive.

He mentions names respected in the profession who have tried and repudiated modern architecture. I suggest he allows them to speak for themselves, perhaps they have only recoiled in order to spring better.

The suggestion that modern architecture should be called Continental Concrete Style is easily answered by the fact that English modern buildings are clearly distinguishable and that our climate will modify design, if Cavalier will allow a little longer for the process to operate.

It is quite unnecessary to point out to modern architects that more study of materials and detailing is necessary, for no one feels it more acutely than the designer when the building falls short of his intentions and his client is let in for maintenance that he was not prepared for. What is striking is the fact that *in spite* of all the blemishes, failures, and the concerted attacks, the recognition that a contemporary architecture is as necessary as contemporary surgery, education or engineering can be assumed among most educated people to-day, and but for the war and the consequent economic stringency, the movement would have consolidated its position much more strongly.

Personally, I am loath to give the impression that if a client goes to the wrong camp for his architect he will get a bad building.

There is a great deal common to both in the sense that both schools will strive to serve their clients to the best of their ability. The traditionalist will endeavour to see that his building serves its purpose, is warm, well ventilated, convenient and weathertight, and so will the modern designer. Surely the situation can be likened to the House of Commons where the Government of the day are kept up to the mark by the Opposition, and the common sense of responsibility is reflected in the broadcast under the title of "The Week in Parliament." Having said this, I will regard Cavalier with affection, respect, and to some extent, pity, as obsolete but still useful.

ROUNDHEAD

CURRENT MARKET PRICES (LONDON)

(These prices apply to material purchased in the quantities named or otherwise as might be expected for a new building of medium size.) **July 1, 1953**

AGGREGATES AND SAND

1½ inch—all in—ballast	21/–	Yard cube
¾ inch do. do.	22/–	delivered
¾ inch screened shingle	20/9	(in five yard
¾ inch do. do.	21/–	loads or
¼ inch granite chippings	60/–	more)
Sharp washed sand	21/–	
Pit sand	20/3	
Building sand	20/3	
Broken brick	17/6	
1½ inch shingle	20/–	
Cartage of muck	7/6	

BUILDING MATERIALS AS DESCRIBED, CENTRAL LONDON

CEMENTS packed in paper bags			Per ton
Portland in 6 ton lots			95/–
Do., from 1 ton to 5 ton 19 cwt do.			104/–
Do., Rapid hardening (6 ton lots)			103/–
Do. (but 1 ton to 5 ton 19 cwts)			112/–
Cement "Aquacrete" (do.)			136/6
Do., "417" or "Polar" (do.)			136/6
Do., "White" (1 ton lots)			155/6

LIME—		123/–	(1 ton loads)	deliv'd.
Hydrated and Ground	including paper bags	120/6	(2/3 do.)	do.
		110/6	(4/5 do.)	do.
		109/–	(6 do.)	do.

PLASTER—		
Keenes, coarse, pink (2 ton lots)	185/6 ton	
Do. do. white (do.)	191/–	do.
Sirapite, do. (2 ton to 3 ton 19 cwt lots)	135/3	do.
Do. finish (do.)	143/3	do.
Hardwall, do. (do.)	146/9	do.
Plaster, coarse, pink (do.)	134/–	do.
Do. do. white (do.)	142/6	do.
⅛in. Plaster baseboard (25 to 149 yds)	2/9	Yard Sup.
Do. (150 to 299 yds)	2/5	do.
3½in Jute scrim (100 yd roll)	8/7	each
Cow hair (under 3 cwt)	97/6	cwt

FIRECLAY—	
Stourbridge, loose (1 ton lots)	156/3 Ton delivered
Fire cement	12/3 14 lbs.

BRICKS

BACKING BRICKS (In truck loads)—		
Flettons	108/–	per 1,000 delivered
Do. Keyed	110/–	do.
Do. bullnose	128/–	do.
Blue wirecuts	451/6	do.
White	185/–	do.
Southwater engineering (No. 1)	318/–	do.
Firebricks—2½ inch	68/–	per 100 delivered
Do. —3 inch	79/9	do.
STOCK BRICKS—		
Mild stocks	170/6	per 1,000 at Works
Second, do.	201/6	do.
First do.	217/6	do.
Add for delivery—approx. 45/– per 1,000 in lorry loads.		
FACINGS (ex truck or lorry)—		
Rustics	133/–	per 1,000 delivered
White	190/–	do.
Blue pressed, 2½in	494/–	do.
Do. bullnose	512/–	do.
Reds (Multi sand faced)	279/–	do.
White glazed stretchers	1280/–	do.
Do. headers	1260/–	do.
Do. bullnose	1600/–	do.
Do. double stretchers	1700/–	do.
Do. double headers	1500/–	do.
Breeze fixing bricks	27/–	per 100
Fire tiles and lumps	31/6	foot cube
Wall ties—8" × ⅞" × 1/16", black	65/9	per cwt.
Cement mortar (1 : 3) hand-made	80/–	yard cube

BRICKLAYERS' SUNDRIES— AIR BRICKS		9 × 3in	9 × 6in	9 × 9in	12 × 9in
Iron	each	1/10	3/–	4/8	6/1
Galvanized do.	do.	3/8	6/1	9/6	11/11
Terra Cotta	do.	1/3	2/6	6/–	10/2
Chimney pots, Terra Cotta (11 to 25)	do.	1ft 6/8	2ft 11/8	3ft 26/6	4ft 45/8

PARTITIONS—

18in × 9in Blocks keyed for plastering.

	2in	2½in	3in
Per yard super in 6 ton lots			
In solid clinker including any half blocks	3/5	4/–	4/8
In cellular clinker blocks	3/9	4/4	4/11
In hollow clay blocks	4/2	4/5	4/11
Clinker blocks in small quantity	5/–	5/11	6/10

Intermediate quantities in all types may be had at intermediate prices.
Smooth in lieu of keyed faces extra cost per side 3d. per yd. super.

SINKS

Fireclay white glazed in and out—standard quality.

	24 × 18in	30 × 18in	30 × 20in
London pattern, no overflow, 6in deep	56/10	71/3	75/3
Belfast, plain edge, 10in deep	69/3	112/10	151/3

FLUE LININGS PLAIN, CIRCULAR

	Foot lineal Straight	Each Bends
9in diameter	3/8	11/–
10in do.	4/7	13/9
12in do.	8/8	26/–
9in diameter, beaded end, 12in high		4/10

FLUE PIPES AND FITTINGS

	4in	5in	6in
Heavy asbestos type, 6ft. length	15/3	21/–	26/6
Do. 3ft length	7/8	10/6	13/3
Do. bends	5/9	7/3	8/8
Light asbestos type, 6ft length	12/6	15/9	21/–
Do. 3ft length	6/3	7/11	10/6
Bends	4/7	5/9	6/11
Baffler	12/5	14/9	15/8

DRAINAGE GOODS

GLAZED STONEWARE STANDARD LIST

ORDINARY TYPE—EACH	4in	6in	9in
Pipes in 2 feet lengths	1/8	2/6	4/6
Bends	2/6	3/9	10/1½
Junctions (4in on 4in, 6in on 6in, 9in on 9in)	4/2	6/3	13/6
Gullies with 4in outlets	6/3	6/10½	11/3
4in horizontal inlets	2/–	3/–	5/–
4in vertical ditto	3/–	4/–	7/–
Black iron grids	9d	1/5	2/9

Adjustment to Current Cost

	2 ton lots or more	Less than 2 ton lots: 100 pieces or more	Less than 2 ton lots: Under 100 pieces
"Best" pipes and fittings. Percentages to add	67½	97½	107½

Further percentages to be independently added in respect of: British Standard pipes, etc. 10. "Best" Tested pipes, 37½. British Standard Tested, 47½.

IRON DRAINAGE GOODS—

Under 2 ton lots.

Each	4in	6in
Cast iron pipes, 9 feet long	60/3	89/6
Do. 6 feet do.	44/1	69/5
Do. 4 feet do.	34/9	55/–
Do. 2 feet do.	21/4	33/4
Short bend	13/10	28/10
Junction	24/5	49/11

Decoration

Photograph by courtesy of the Victoria and Albert Museum.

Fancy took wings — and truly fabulous shape —
when this ewer was fashioned in bronze by a Mosan artist.
Enriched with an ornament of gilt,
silver and niello, seven centuries have not
dulled its lustre.

HERMATOR SUPER GLOSS PAINTS, full-bodied,
free-flowing finishes of exceptional brilliance,
retain their gloss and elasticity
in the face of age and every climatic extreme.

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DUCTUBE Saves over £10 a pair on Main Services

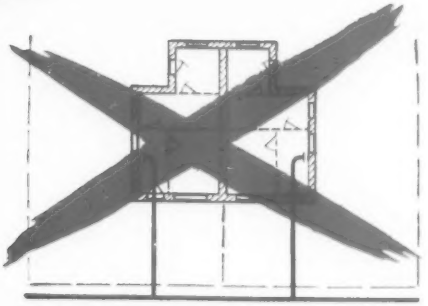
TYPICAL EXAMPLE

SAVING

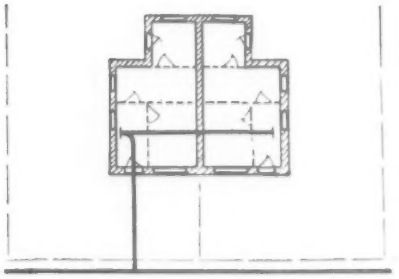
	£ s. d.	£ s. d.
15 yds. excavation 18" trench	3 15 0	
15 yds. cable ·0225 x 2	4 12 6	
Jointing materials and labour	6 0 0	
Laying, labour only	2 15 0	
	17 2 6	
Overheads + 15%	2 10 4	
		19 12 10

ADDITIONAL COSTS

	£ s. d.	
Formation of 30 ft. duct cast in site concrete using 1½" Ductube written off over 100 uses	10 0	
Supply, lay and joint 30ft. ·007 "cabtyre" house service cable	4 0 0	
Supply and fix protective metal conduit and inspection box	1 5 0	
	5 15 0	
Overheads + 15%	17 3	
		6 12 3
NET SAVING PER PAIR OF HOUSES		13 0 7



PRESENT SYSTEM Each house has a separate armoured service cable, laid in a trench from the main cable in the road.



"DUCTUBE" SYSTEM Only one armoured service cable is laid from the road to one house of each pair, or block of three, and from that meter position, suitably protected, a T.R.S. cable is run in a "Ductube" duct in the site concrete to the meter positions in the other houses.

DUCTUBE Pneumatic Tubing, the most economical method of forming ducts in concrete, is now available in the following diameters :—¾", 1", 1⅜", 1½", 1¾", 2", 2½", 3", 3½", 4", 5", 6", 7", 8", 9" and 12", and CONTIDUCT from 12" to 48". Certain diameters of **DUCTUBE** can be hired.

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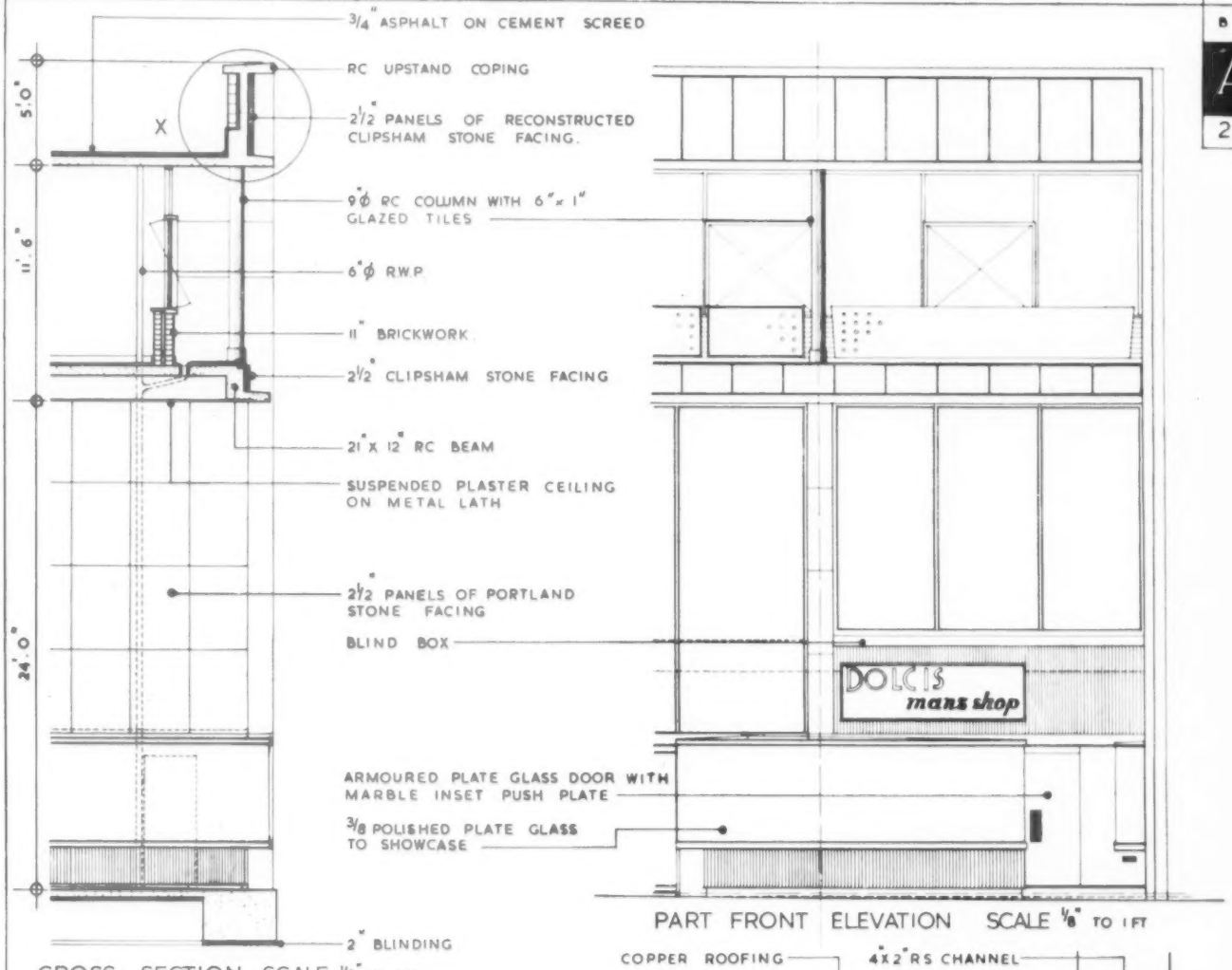

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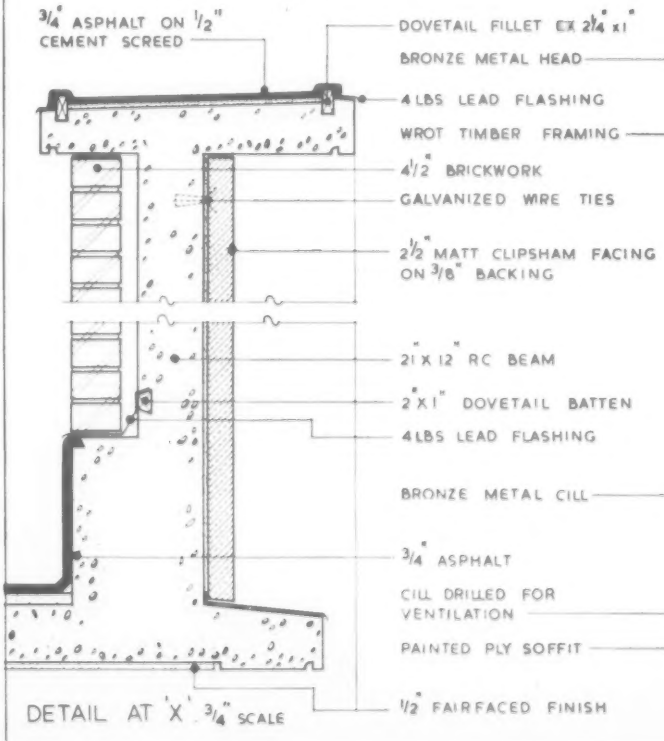
3/4" ASPHALT ON 1/2" CEMENT SCREED
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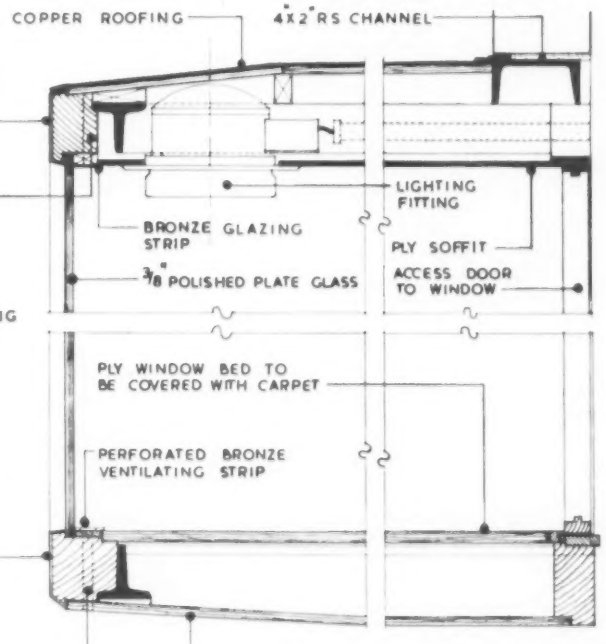
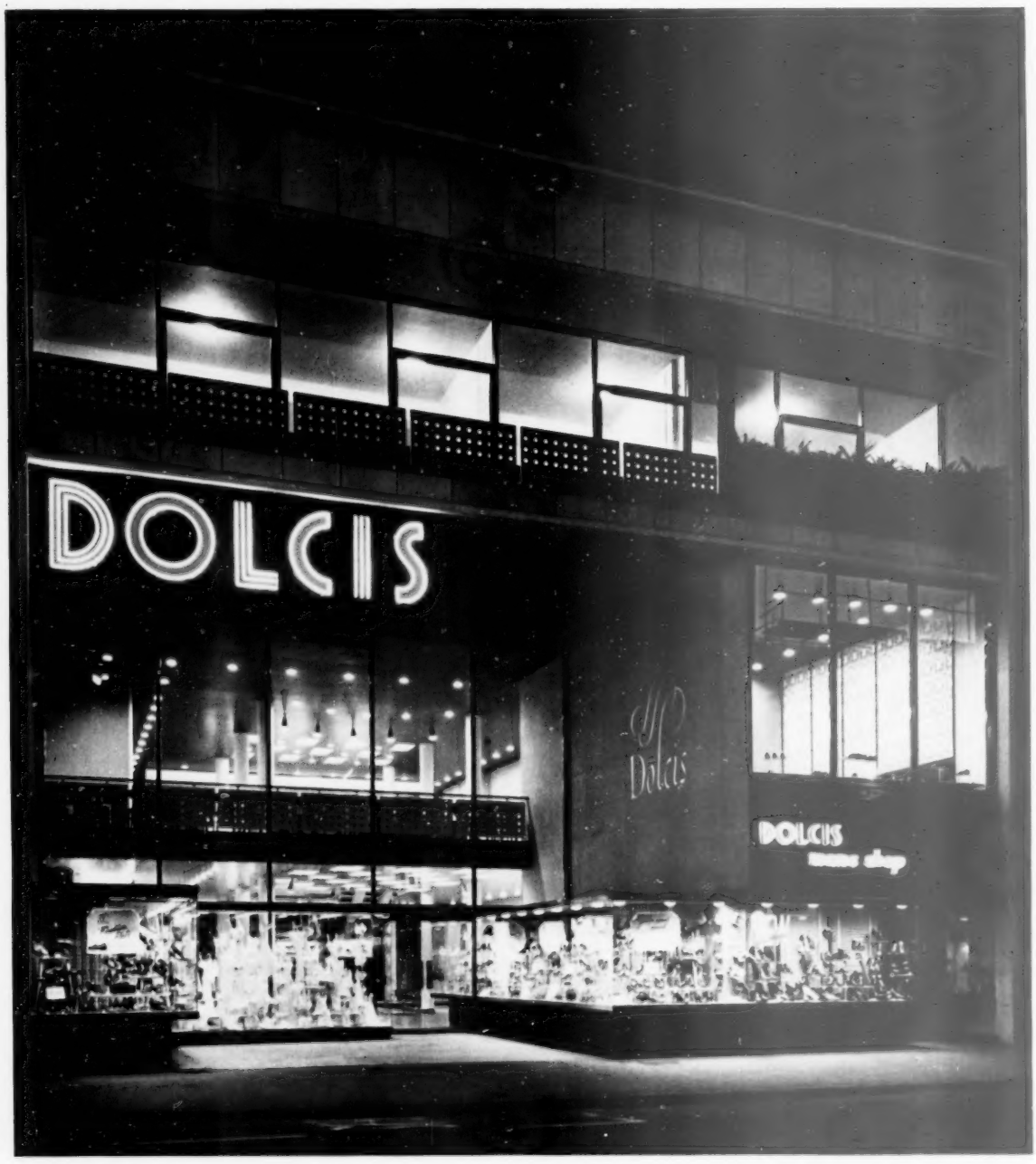
DETAIL AT 'X' 3/4" SCALE



TYPICAL DETAILS OF SHOW WINDOW SCALE 1/8 FULL SIZE

DETAILS OF SHOP-FRONT BROADMEAD BRISTOL • ELLIS E SOMAKE



SHOPFRONT, BROADMEAD, BRISTOL

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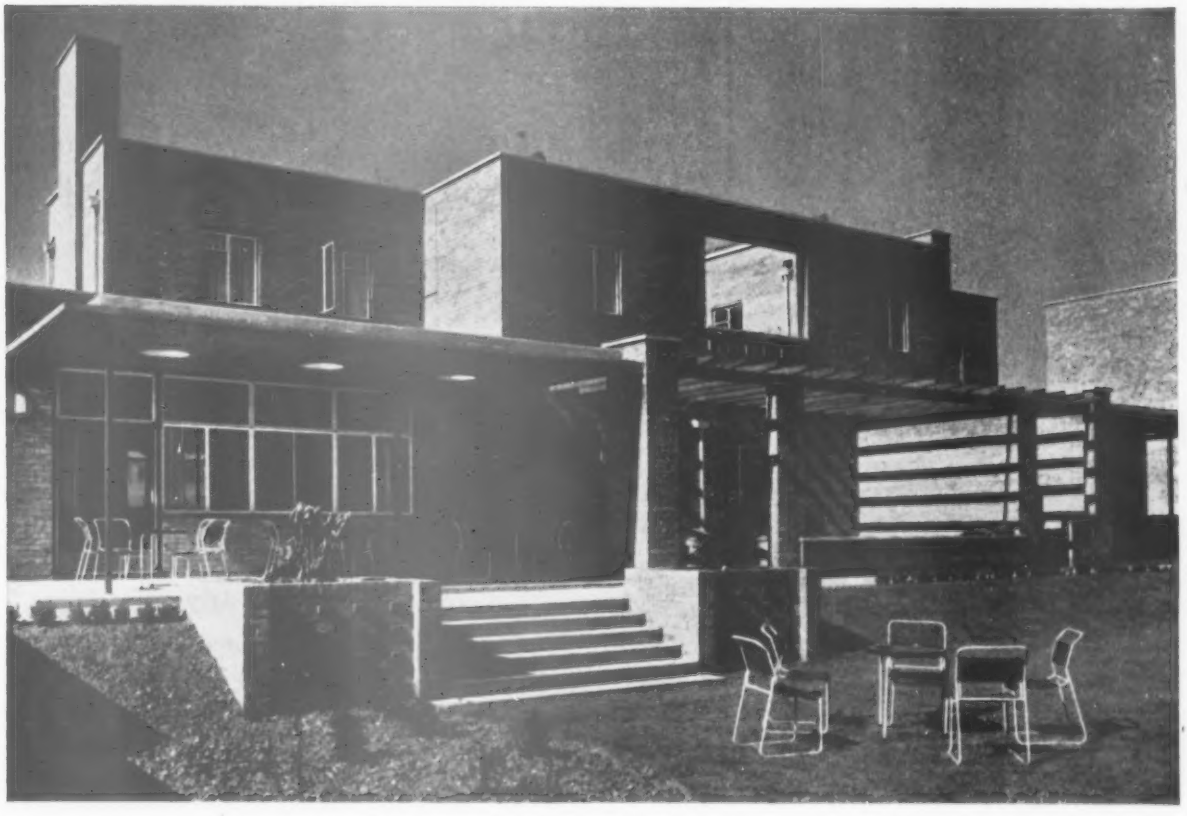

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H. Kellett Ablett, F.R.I.B.A., M.T.P.I.
Chief Architect to The Hemel Hempstead Development Corporation

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The customers, inhabiting the Adeyfield Neighbourhood are doubly fortunate, since their houses (well over 1,000 of them) are also fitted with Crittall Hot-Dip Galvanized Windows.

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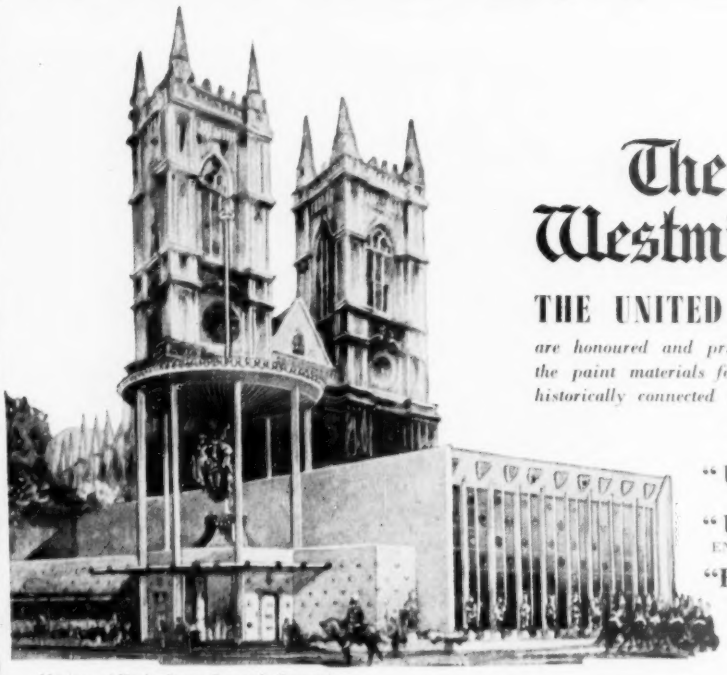

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REBATED *Channel Reinforced* WOOD WOOL ROOFING SLABS

THERMACOUST 3″ Rebated Roofing Slabs provide higher overall insulation. They are particularly valuable in buildings where the atmosphere may be exceptionally warm or humid. They are rebated to take 1″ insulating cork strips; in severe weather these prevent condensation on the lower flanges of the steel reinforcing channels.

THERMACOUST 3″ Rebated Roofing Slabs have the same advantages for rapid labour-saving construction as the well-known Thermacoust 2″ Roofing Slabs. They are large in unit size, easily handled, can be worked with ordinary wood-working tools. For the majority of applications, we recommend Thermacoust 2″ Roofing Slabs; for the more complicated insulation scheme, architects are now using the 3″ Rebated Slabs for Schools, Factories and Municipal buildings. Standard slabs, *both types* 6′ long; 6′ 8″ and 7′ slabs made to order.

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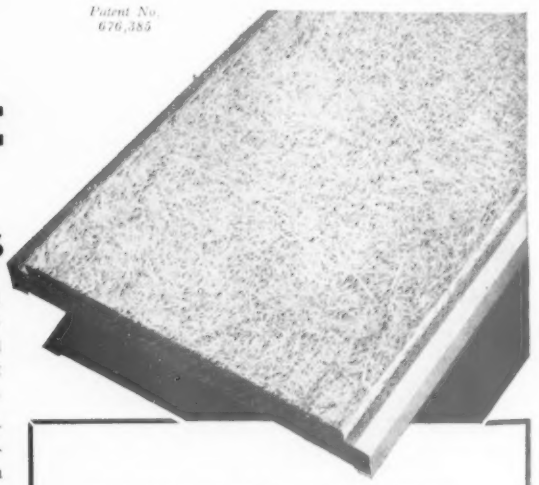

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DRAINAGE GOODS—*Continued*

GULLEY PARTS—	4in	6in
Traps, high level, invert	23/6	57/- each
Inlet, bellmouth pattern	16/-	24/6 do.
Do. with one vertical branch	23/6	38/- do.
Do. with two do.	53/-	95/- do.
Sealed cover, with felt washer	8/6	18/- do.

RAINWATER SHOES	4in	6in
With vertical inlet and rebated top	27/-	72/- each
Extension piece, 6in high	17/-	17/6 do.
Flat loose coated grating	3/6	4/- do.
Loose solid coated cover	5/9	6/- do.

MANHOLE CHANNELS, WHITE GLAZED— Each	4in	6in	9in
Straight, 2 feet long	13/3	18/8	31/11
Taper, ditto	22/-	22/-	33/-
Bends, main, half section	25/4	36/4	59/5
Ditto, branch, ditto	15/5	22/-	—
Ditto, ditto, three quarters, ditto	22/-	34/1	—
Junctions, single	20/11	36/4	—
Ditto, double	28/7	49/6	—

BROWN GLAZED CHANNELS—
Based on standard list (less than 100 pieces)

	4in	6in	9in
Half-round main channel (2ft long)	2/8	3/11	7/-
Extra for stop ends	2/8	3/11	7/-
Extra for outlets	5/3	7/10	—
Channel bends with splayed ends	7/10	11/8	—
Three-quarter section do.	10/5	15/7	—

MANHOLE COVERS—	Black
24 × 18in Light foot traffic	32/6 each
Do. Strong do.	48/6 do.
Do. Light car traffic	102/- do.
Do. Road traffic	155/- do.

SUNDRIES—	Galvanized
Manhole steps	8/6 each
4in Mica valve fresh air inlets (L.C.C.)	23/- do.
Plumber's hemp	6/- per lb.
Gaskin, caulking	1/9½ do.
Canvas backed hair felt, 4in. wide	9*d*. per ft run

ROOFING MATERIALS

WELSH SLATES (delivered)—

Sizes in inches	Quantity 1,000 to 1,999 per 1,000	100 to 499 per 100	1 to 99 per doz.
22 × 11	1840/-	222/9	29/6
20 × 10	1579/6	191/3	25/3
18 × 10	1167/3	141/3	18/9
16 × 8	784/-	95/-	12/6
14 × 9	700/9	84/9	11/3
14 × 4½	313/-	37/3	5/-

TILES (Broseley and Staffordshire)—	per 1,000	per 100
10½″ × 6½″ Machine made	285/6	34/9
Do., hand made, sand faced	335/-	40/6
Hips, valleys and angles	29/9 per dozen	
	Per 1,000	Per 100
Plain concrete tiles	175/-	19/3

Sheeting asbestos corrugated, 6in pitch (23 to 85 super yard lots)	6/1½ yard super
4½in. × 16 gauge, drive screws (galvanized)	16/9 gross
7½ × ⅝ hook bolts and nuts (do.)	60/- do.
Washers, round, flat, galvanized	4/9 do.
Do. do. bituminous	2/- do.

ROOFING FELT—		
Sanded bitumen felt (55lb)	1/-	Yard Super
Ditto, but 75lb in weight	1/6	Do.
Inodorous felt, best quality	3/-	Do.
Ditto, second quality	2/4	Do.
Underlining	1/8	Do.
Sheathing	1/8	Do.
Galvanized felting nails	1/6	lb

PRECAST CONCRETE LINTOLS—
1 : 2 : 4—¾in material, finished with fair exposed faces, including all form-work and one ½in diameter mild steel rod reinforcement to each 4½in in width.
Per foot lineal delivered to site.

4½in × 6in	9in × 6in	9in × 9in	13½in × 9in	18in × 9in
4/-	6/-	7/8	9/6	11/6

STONE

PER FOOT CUBE in random blocks not exceeding 20ft average in each.
BATH STONE F.O.R. SOUTH LAMBETH—
Monks Park 6/8 St. Aldhelm 7/8 Doulting 7/5
STONE F.O.R. NINE ELMS—
Portland brown Whitbred 7/5. Beer 7/-.
Over 20ft average cube blocks extra cost.

TIMBER

Softwood—sawn—random lengths.

	Per Standard.	Per cubic foot.
Carcassing quality	£100	12/1½
Joinery quality	£120 and up	13/4

Plain edged unsorted flooring, per square	¾in	1in	1½in	1¾in
	90/-	110/-	138/-	165/-

½in insulating wall board (600 yards) 4/8 yard super.
Larger quantities cost less, and smaller quantities more.

SUNDRIES—	Dia.	3in	6in	9in
Black hexagon bolts, nuts and washers. Each	½in	5*d*.	7*d*.	9*d*.
	⅝in	7½*d*.	10*d*.	1/1*d*.
	¾in	10*d*.	1/2*d*.	1/5*d*.
Sashline, hemp, good quality Per Yard Run	No. 6 9d.	No. 8 1/-	No. 10 1/3	
Floor brads	67/- per cwt			
Cut Clasp Nails	70/- per cwt			
Steel ordinary screws	1″ No. 8 2/4	2″ No. 8 3/9	per gross	
Brass, ditto	Do. 7/-	Do. 13/2		

HARDWOOD—

Prime	Per ft super ¾in	1in	Per ft cube
African mahogany	2/4	2/6	28/-
Honduras ditto	4/-	4/7	55/-
Portuguese Guinea ditto	3/1	3/3	36/-
African walnut	2/5	2/7	29/-
Australian ditto	5/6	5/10	65/-
English oak	4/3	4/6	50/-
Yugoslavian ditto	3/4	3/7	40/-
Burma and Siam Teak	4/8	5/-	56/-

DOORS.—STANDARD TYPE SOFTWOOD

Each in quantities 12 or more.
1⅜in finish, 4 horizontal panels moulded both sides. 6ft 6in high.
2′ 3″ wide 41/3
2′ 6″ do. 42/6
2′ 9″ do. 43/9

FLUSH DOORS 1⅜in thick, ply faced both sides, lipped edge.
All 6ft 6in high.
2′ 3″ wide 51/6
2′ 6″ do. 52/6

PANELLED DOORS: see B.S. 459—Part 1.

FLUSH DOORS:—see B.S. 459—Part 2.

2in (nominal) as last but upper panel prepared for glazing
2′ 6″ wide 59/-
2′ 9″ do. 62/-
2in (ditto) all as above but in 3 panels.
2′ 6″ wide 55/9
2′ 9″ do. 58/3
2in (ditto) all as above but in 2 panels.
2′ 6″ wide 51/3
2′ 9″ do. 53/6

IRONMONGERY

	2in	3in	4in	5in	6in
Cast iron Butts, per pair	11½*d*	1/6	2/4½	4/4½	6/3
Hinges, spring, single action regulating, japanned, each	—	6/9	9/-	12/-	15/-
Do. but double action spring only, each	—	12/-	15/6	22/9	27/9
Do. blank only, each	—	5/6	10/6	12/9	16/6

CURRENT MARKET PRICES (Continued)

IRONMONGERY—Continued

	12in	18in	24in	30in	36in
Tee hinges (japanned), per pair	2/-	3/10	—	—	—
Do. but stronger, per pair	3/4	6/1	8/3	—	—
Hook and Ride hinges, per pair	—	—	13/4	16/3	24/10
BOLTS—each—	3in	4in	6in	8in	10in	12in
Cabinet, barrel, straight or necked	1/7	1/9	2/4	—	—	—
Square spring, with brass knob	1/6	1/9	2/4	—	—	—
Tower bolts	—	1/8	2/6	3/3	4/1	4/10
Barrel bolts	—	2/10	4/1	5/4	6/10	8/3
Add to Tower or Barrel bolts if necked	—	4½*d*	5½*d*	6½*d*	6½*d*	6½*d*

LOCKS—each

Rim lock, 2 lever, wrot case brass bolt and bushing	11/9	Brass furniture	3/-
		or Bakelite do.	3/1
		Bakelite finger-plates	2/3
Mortice lock, 2 lever, bushed	15/8	Brass furniture	7/-
		or Bakelite do.	3/8
Cylinder latches, japanned case			17/-
Brass sash fastener		each	4/-
Casement fasteners (malleable)		do.	1/6
Do. stays (do.)		do.	2/-
Axle pulleys (brass face, iron wheel)		do.	3/4
Do. as last, but with brass wheel, 1¾in		do.	4/1
Sash line, No. 8 Anchor yellow label		per yard	1/-

METAL GOODS

Basis—Rolled steel joists, all sections from 5″ × 4½″ to 16″ × 6″ inclusive (except 9″ × 7″, 10″ × 8″, 12″ × 8″ and 14″ × 8″) (over one ton)	£38/-/-	per ton
Extras—9″ × 7″ section	5/-	do.
4″ × 4″, 5″ × 3″, 10″ × 8″, 12″ × 8″, 14″ × 8″ and 16″ × 8″ to 20″ × 7½″ sections inclusive	10/-	do.
22″ × 7″ section	15/-	do.
4″ × 2½″, 4″ × 3″, and 24″ × 7½″ sections	20/-	do.
Steel angles and tees	£40/-/-	do.
Steel bars	£38/-/-	do.
Mild steel rods ⅝″ diameter and upwards, cut to lengths within the usual margin and bent to normal schedules for reinforcement	49/-	per cwt
Extras per ton		
⅝in and ½in diameter in size	27/-	per ton
⅞in do. do.	27/-	do.
¾in do. do.	34/6	do.
⅝in do. do.	42/-	do.
½in do. do.	72/-	do.
⅜in do. do.	102/-	do.
Extras for length		
5ft to 3ft	7/6	do.
3ft to 2ft	15/-	do.
2ft	22/6	do.
40ft to 45ft	15/-	do.
45ft to 50ft	22/6	do.
Bolts and nuts	80/-	per cwt
Trench covering, including trays 1¼in deep and rebated frames, 9in wide	19/9	foot run
Do., but 12in wide	21/9	do.
Do., but 14in wide	23/-	do.
Do., but 18in wide	30/-	do.

METAL SUNDRIES

Cast iron pavement light filled with 4in × 3in glass lenses	38/-	per ft. super
¼ in wrought iron plate door in four panels with stiles and rails on both sides	40/-	do.
20 gauge galvanized iron trunking and straps	4/-	do.
24 gauge galvanized Tallboy 6ft high 9in diameter with 9in × 12in base	45/-	each.

CHAIN LINK FENCING—

In 25 yards lineal rolls inclusive of line wire.

2in mesh.	Height in inches— 36	42	48	60	72
10½ wire gauge	84/5	98/7	112/9	140/7	168/11
12½ do.	59/5	69/4	79/3	99/1	120/11
14½ do.	42/3	49/6	56/7	70/9	84/11

DOUBLE SOOT DOORS AND FRAMES—

Fitted with brass turnbuckle and cast key	9in × 9in 17/3	12in × 9in 22/-	14in × 12in 35/-

SLIDING DOORS, GATES AND PARTITIONS—

Factory sliding doors in two leaves containing about 100 square feeet with mild steel angle frames covered with 24 gauge corrugated galvanized sheeting and including hanging tubular track and gear complete	13/6	foot super
Factory entrance gates with mild steel frames clad with 2in mesh chain link complete	10/6	do.
Steel partitioning, glazed (rough cast) and stove enamelled	16/-	do.

STEEL ROOF LIGHTS—

Lanterns with vertical sides, and hipped roof, glazed with ¼in cast glass and lead flashed.	16/-	foot super
Skylights of similar construction (180ft super)	15/-	do.

HIGH GRADE DOMESTIC BOILERS

Coke fed. Performance 20 to 40 gallons raised from 40°F to 140°F per hour as under.

TYPE		£	s	d
20 gallons per hour 15in wide, 23in high.	Plain cast iron black finish	7	3	3
	Ditto, in cream mottle finish including side jackets	10	3	6
25 gallons per hour 19in wide, 22in high	In cast iron as before and base plate	10	13	6
	Ditto in cream mottle with side jackets and base	15	13	9
40 gallons per hour 22in wide, 23in high	In cast iron, etc. as last ditto	16	18	6
	Ditto in cream mottle all as last ditto	22	18	0

GAS, WATER AND STEAM TUBES

(From Standard List.)

Internal Diameter—	⅛in & ¼in	⅜in	½in	¾in	1in	1¼in	1½in	2in
Tubes per ft	4*d*	4½*d*	5½*d*	6¾*d*	9½*d*	1/1	1/4½	1/10
Bends each	8*d*	9*d*	11*d*	1/2	1/7½	2/7½	3/2	5/2
Elbows, sq. do.	10*d*	11*d*	1/1	1/3	1/6	2/2	2/7	4/3
Do., round do.	11*d*	1/-	1/2	1/5	1/8	2/4	2/10	4/8
Tees do.	1/-	1/1	1/3	1/7	1/10	2/6	3/1	5/1
Crosses do.	2/2	2/4	2/9	3/3	4/1	5/6	6/7	10/6
Backnuts do.	2*d*	2*d*	3*d*	3½*d*	5*d*	6*d*	8*d*	1/1
Sockets do.	3*d*	3*d*	4*d*	5*d*	6*d*	8*d*	10½*d*	1/3
Sockets, dimin. do.	4*d*	5*d*	6*d*	7*d*	9*d*	1/-	1/4	2/-

PERCENTAGES ON OR OFF ABOVE

In quantity and in random lengths.

TUBE—				
Class A (light)	−20%	Black	+6%	Galvanized
Class B (medium)	−10%	Do.	+10%	Do.
Class C (heavy)	+2½%	Do.	+27½%	Do.
FITTINGS				
Lightweight	+12½%	Black	+23½%	Galvanized
Heavy	+19%	Black	+32½%	Do.

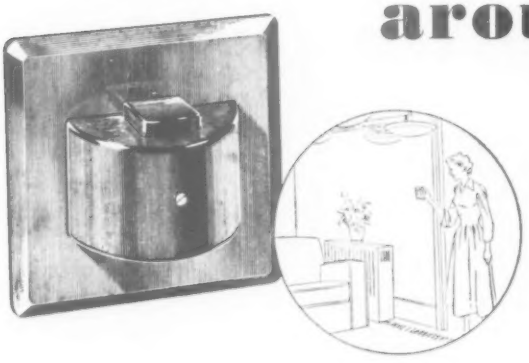
RAINWATER GOODS (Painted or Unpainted)

In consignments of 3 cwt and over.
From Standard List.

Pipe:		2in	3in	4in	5in	6in
6ft lengths	each	10/8	12/6	16/5	21/5	27/5
3ft do.	do.	5/10	6/9	8/8	11/4½	14/4½
Shoe, ordinary	do.	2/3	3/4	4/10	8/2	11/3
Bend	do.	2/8	3/9	5/5	9/9	12/8
Branch, single	do.	3/11	5/9	8/-	12/8	19/8
Offset, 4½in	do.	3/3	4/7	6/9	11/3	14/9
Do. 9in	do.	4/3	5/8	8/5	13/3	16/9
H.R. gutter, 6ft length	do.	—	5/3	7/4	9/-	12/-
Angle or nozzle	do.	—	2/2	2/8	3/3	4/8
Stop end	do.	—	8*d*	11*d*	1/4	1/6

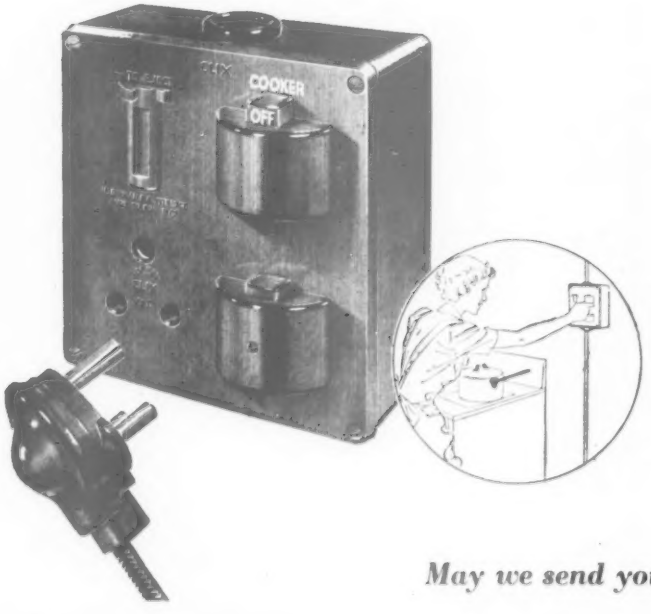
Rainwater goods *plus* 7½% at foot of invoice.

SWITCHING around the house



For every switch position there's a matching Surrey switch. Efficient, distinctive switches with the unique sliding bar action to give that touch of quality to your next electrical installation.

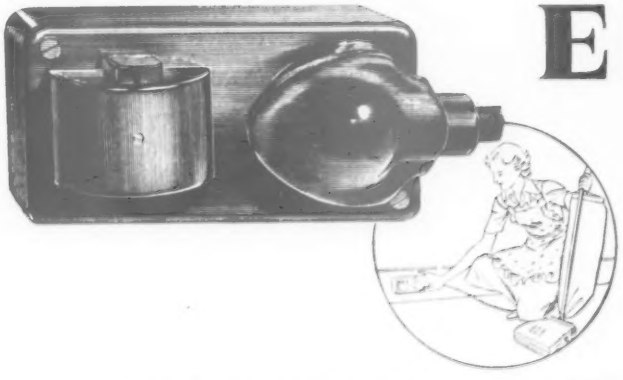
5 amp. and 15 amp. switches with specially designed microbreak action, silver contacts, moulded cover and specially moulded switch-plates and mounting blocks.



Cooker control unit comprising two Surrey type switches, a Clix shuttered socket outlet and a unique fuse unit with a special holder. This unit is also available with a socket to receive a 13 amp. BS 1363 fused plug.

5 amp. and 15 amp. switch socket outlets combining the high quality Surrey switch with a Clix shuttered socket. Can be made right handed or left handed at will and the flexible cord cannot become jammed against the floor even when mounted at floor level.

May we send you a catalogue and a sample switch?



EDISWAN

CLIX

As with all Clix products, Surrey switches are now marketed by Ediswan, thus providing a complete Ediswan electrical service.

THE EDISON SWAN ELECTRIC COMPANY LIMITED
155 Charing Cross Road, W.C.2 and Branches
Member of the A.E.I. Group of Companies

813

ELECTRICITY for more prosperity

PAST

There were only six occasions during each of the past two winters when the demand for electricity exceeded the available supply. In those periods, interruptions by power cuts were brief and affected relatively few people.

The first task of British Electricity—restoration of the pre-war reliability of electricity supply—has, in fact, been substantially achieved. Supply service will improve further in the years ahead.

PRESENT

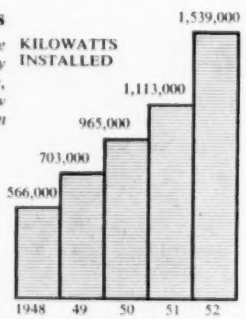
Today there is plenty of electricity for all consumers, industrial, commercial and domestic. The power stations are producing only about half their full potential output during the working week; at weekends there is a still larger surplus capacity.

FUTURE

This vast potential electricity supply—approximately equal to the 57,000,000,000 units sent out from the power stations last year—is on tap at the touch of a switch.

Five years' Progress

In the five years since the British Electricity Authority came into being, record amounts of new generating plant have been installed each year.



In 1952 there was installed more than twice the pre-war record figure of 759,000 kilowatts.

BRITISH ELECTRICITY

"Ah, now I see, sir!"

Our chairman was raised in the simple faith that every picture tells a story. So he is a firm believer in the value of WEST photo-copies to circulate information quickly and accurately.

The beauty about photo-copies, he says, is that they leave no room for mistakes or arguments. The design, plan, drawing, or message is down in black and white for the whole world to see, and once seen is never forgotten.

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CURRENT MARKET PRICES *(Continued)*

PLASTERING MATERIALS

Sand, lime, cements and various plasters are previously included under those heads—

Metal lathing (⅜" × 24G.) (20 yds.)		3/2	sq yard
Plaster baseboard, ⅜" (600 yards)		2/3	do.
Lath nails, galvanized		1/1	lb
White glazed tiles (6" × 6" × ¼")	small quantity	16/9	sq yard
Do. rounded on one edge	small quantity	20/–	do.
Do. on two adjoining edges	small quantity	24/6	do.

PLUMBER'S GOODS

4 lb lead sheet (in 1-ton lots)	131/– per cwt
Lead water pipe in coils (do.)	132/3 do.
Plumber's solder	3/3 lb.
Copper tacks	5/6 do.

IRON SOIL AND WASTE PIPE. (Standard List)

each	2in	3in	3½in	4in
⅜in Medium pipe, 6ft lengths	12/7	14/11	16/9	19/1
Ditto, 4ft length	9/0½	10/7½	11/10	13/4½
Bends	4/8	5/8	7/–	7/11
Ditto, with oval door	15/2	16/2	18/3	19/2
Junction, single	5/8	8/5	9/9	11/6
Ditto, with oval door	16/2	18/11	21/–	22/6
Swan necks, 4½in	5/8	8/11	10/3	11/11
Ditto, 9in	7/6	10/3	11/11	14/–
Holderbat, 2½in projection	4/8	4/10	5/1	5/2

All *plus* 7½% added at foot of invoice.

GALVANIZED CISTERNS, TANKS AND CYLINDERS—(Less than four)

each	gallons			
CISTERNS—	Nominal capacity			
Bends over tops and corner plates. Riveted or welded	100	150	200	300
14 gauge	144/–	197/–	239/–	342/–
12 ditto	167/–	212/–	263/–	467/–
¼in plate	199/–	250/–	300/–	420/–
HOT WATER TANKS— Riveted and with handhole and ring.	20	25	30	40
12 gauge	100/–	111/–	121/–	144/–
¼in plate	110/–	121/–	131/–	161/–
HOT WATER CYLINDERS— Riveted, with handhole and ring.	20	25	33	39
12 gauge	127/–	141/–	153/–	164/–
¼in plate	142/–	157/–	173/–	184/–

PLUMBER'S BRASSWORK, etc.

	Each			
	½in	¾in	1in	1¼in
Boiler screws, single nut	1/5	1/10	2/9	4/6
Ditto, double nut	1/10	2/6	4/3	6/3
Cap and lining	1/–	1/6	1/8	1/10
Plumber's unions	2/3	3/–	4/–	6/3
Ball valves, screwed iron	16/6	29/–	—	—
Ditto, fly nut and union	17/6	31/6	—	—
Bib valves, crutch top screwed iron	7/9	12/3	—	—
Ditto, but screwed boss	9/6	14/–	—	—
Stop valves, screwed iron	8/–	11/–	—	—
Ditto, screwed iron and union	8/9	13/–	23/6	—
Ditto, double union	9/9	15/9	26/–	—
Waste, plug chain and stay	—	—	6/–	6/6
	1¼in	1½in	2in	4in
Caps and screws	2/9	3/–	5/–	—
Sleeves, long	—	—	6/9	11/–
Ditto, short	—	3/2	4/3	6/9
Thimble	—	4/–	5/–	10/7
Full way gate valves, hot pressed	17/6	24/3	—	—
	1¼in	1½in	2in	
Lead 7 lb. P. trap	6/2	8/1	11/5	
Ditto, S. trap	7/8	10/–	14/1	
Lead 6 lb. P. traps with 3in seal	6/11	8/4	—	
Ditto, but S traps ditto	8/7	10/6	—	

Wire balloon guards, copper, 2in 3/–; 4in 3/10.
Ditto, galvanized iron, 2in 1/9; 4in 2/–.
Hair felt, 34in × 20in, 24 oz., 6/– sheet.
Boss white jointing compound, 2/– lb.
Gaskin, 1/5½ lb. Hemp, 6/– lb.

COPPER TUBES—Extract from B.S. 659/1944—

Nominal bore	Internal work (semi hard). Outside diameter inch	Gauge	Weight lb per ft	3 Cwts lots Price per lb pence	Price per ft pence
½in	0·596	19	0·27	40½	10·94
¾in	0·846	19	0·39	39	15·21
1in	1·112	18	0·62	37½	23·25
1¼in	1·362	18	0·76	37	28·12
1½in	1·612	18	0·91	37	33·67
2in	2·128	17	1·40	38½	53·90

CAPILLARY TYPE CONNECTIONS—

All ends copper to copper.

Each	½in	¾in	1in	1¼in	1½in	2in
Straight	1/9	2/6	3/11	5/1	6/10	9/10
Bends	4/7	5/11	8/5	11/1	17/4	25/6
Tees	4/3	4/11	8/–	11/7	16/6	25/6
Brackets (brass)	2/1	2/3	2/6	—	—	—

GLASS

	Per foot superficial 24 oz.	26 oz.	32 oz.
English, flat drawn sheet glass cut to sizes in squares	7½*d.*	9½*d.*	1/–
Figured rolled and cathedral, white, cut to sizes, in squares (¼in)	9*d.*	Per foot super	
Ditto, but in standard tints	1/4½	Do.	
¼in Rolled, cut to size, in squares	9*d.*	Do.	
¼in or ⅜in. Rough cast ditto	1/–	Do.	
¼in Ditto wired ditto	1/1	Do.	
Georgian wired ditto	1/1½	Do.	
Fluted (No. 4) ditto	1/0¾	Do.	
Reeded (narrow, broad, cross and major) ditto	1/1	Do.	
Reedlyte (narrow and broad) ditto	1/1	Do.	
Spotlyte ditto	1/1	Do.	
¼in Calorexficast ditto	1/2½	Do.	

	Each 5¼" × 5¼"	7¼" × 7¼"
3⅞in hollow glass light diffusing blocks	2/9	4/2
Ditto corner blocks	5/3	6/9

POLISHED PLATE GLASS. (Tariff). Cut to sizes.

Ordinary substance approximately ¼in thick.

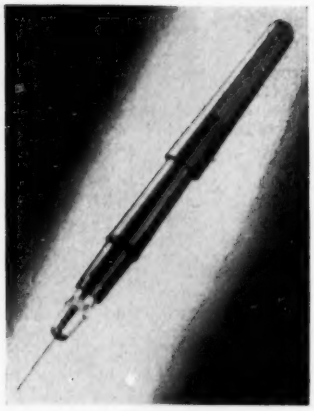
Per superficial foot.	Qualities General Glazing	Selected Glazing	Silvering
In plates not exceeding:			
2ft super in each	3/7	4/3	5/1
5ft ditto	4/5	5/2	6/2
45ft ditto (unless extra sizes)	5/1	5/9	6/11
100ft ditto (ditto)	5/6	6/9	8/10

Extra sizes, i.e., Plates exceeding 100ft super or 96in high or 160in wide at higher prices.

DECORATING MATERIAL

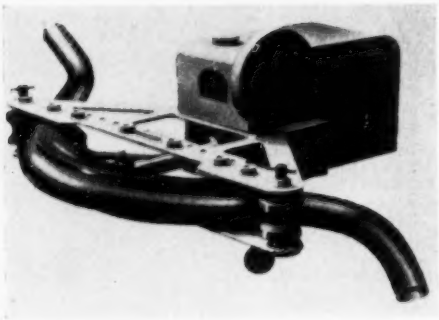
	Price	Unit
Aluminium Paint	37/6	Gallon
Distemper, ceiling	33/9	Cwt.
Distemper, washable	120/–	do.
Enamel	65/–	Gallon
Gold Metallic Paint	86/6	do.
Heat Resisting Paint	50/–	do.
Japan, black	23/6	do.
Knotting	30/–	do.
Linseed Oil	20/6	do.
Boiled, ditto.	21/–	do.
Proprietary Paints (good class)—		
Finishing	59/6	do.
Priming	55/–	do.
Undercoat	57/–	do.
Paperhanger's Paste	34/6	Cwt.
Petrifying liquid	8/6	Gallon
Putty	57/6	Cwt.
Size	9/3	Firkin
Terebine	16/–	Gallon
Turpentine substitute	6/2	do.
Varnish, oak, copal, inside use	35/–	do.
Ditto, ditto, outside use	40/–	do.
Ditto, white, eggshell, flat	44/6	do.
White lead mixed paint	59/–	do.
White lead	167/6	Cwt.
Whiting	12/6	Cwt.

MOSAICS



PLANT
HANDTOOLS
E 3/25

The Lubristyl pocket oil-pen for the accurate placing of lubricating oil under complete control. Pressure on the point of the needle allows oil to flow at a speed that varies according to the pressure applied. On release of the pressure surplus oil left on the surface is sucked back into the pen. Made in three grades with a thick, medium or fine needle at a cost of 12/6d. each by CIDIS of Switzerland and sold by The Wayne V. Myers Co. Ltd., manufacturers of Red-X oil additive and tuning equipment, 365 High Road, Chiswick, London, W.4.



PLANT
HANDTOOLS
E 3/26

In addition to bending steam and gas tubes of ¾in to 4in N.B. the "Staffa" 4in hand operated or motorized portable hydraulic tube bending machines, manufactured by Chamberlain Industries Limited, of Staffa Road, Leyton, London, E.10, are now able to handle cold and unloaded solid drawn and hydraulic steel tubing up to 3½in o.d. x 5/16in wall thickness with the minimum of effort on the part of the operator.

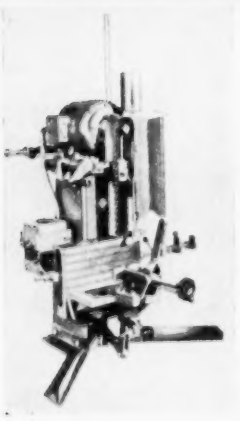
The hand operated version utilizes a two-stage hand hydraulic pump. The motorized version is powered by a ¾ h.p. electric motor, 220-380 v. single phase but customers' special requirements can be catered for.

A 50 ton horizontal bender is also produced by this firm, capable of bending up to 6in N.B. tubes.

SERVICES
WATER HEATING
B 6/9

The Oilking Conversion Unit for domestic boilers by Vapourheat Ltd., 212-213, Grand Buildings, Trafalgar Square, W.C.2, has been designed to convert solid fuelled or gas-fired boilers, stoves, furnaces, cooking ranges etc. to oil fuel.

Designed as single, double and twin double units with average fuel consumption respectively of 1½, 2½ and 5 gallons each over 24 hours, they run automatically, feed being controlled by a needle valve. The illustration shows a single unit fitted in a typical domestic boiler.



PLANT
HANDTOOLS
E 1/6

A chain mortiser by F. J. Edwards Ltd., of 359-361, Euston Road, London, N.W.1.

It has been proved in practice that 75 per cent of all mortises cut are under ¼in x 2in. With this fact in mind, F. J. Edwards Ltd., have introduced a new Bench-Mounting Chain Mortiser which cuts quickly and accurately all sizes of mortises up to ¼in x 2in. At the same time, larger sizes can be cut in two or more operations.

The new machine weighs 3¼ cwt, and is powered by a totally-enclosed fan-cooled 1½ h.p. motor with push-button starter.

Timber up to 6in deep by 4in wide can be handled, and the machine will take all standard chain sets from 3/16in width by ¼in length by 3½in depth up to ¼in x 2in x 6in. Machine centres 5½in.

Dimensions of the base legs are 2ft 3in by 1ft 6in, and the overall height is 2ft 11in. The machine is robustly and accurately built. The American method of raising and lowering the table, by rack and pinion with locking action to knob, has been adopted, and the unique way in which it is supported eliminates slide wear and gives easy working. The slides are adjustable, and maintain accuracy over a long period of use. Adjustable stops regulate the length of pole to be cut, and there are catch stops for individual holes. The chain guards not only protect the operator without hindrance but also guide the wood chips to the motor extraction fan.

The machine is normally supplied complete with electrical equipment for 400/440/3/50 current.

INDUSTRIAL NOTES

●The Board of Trade invite applications for licences to import wood wool and wood wool rope during the six months July 1 to December 31, 1953.

All licences issued will be valid for the import of these goods originating in and consigned from Austria, Belgium, Denmark, Finland, France, Free Zone of Trieste, Germany (Western Zones), Greece, Iceland, Irish Republic, Italy, Liechtenstein, Luxembourg, Netherlands, Norway, Portugal, Sweden, Switzerland and Turkey.

Applications for such licences should be made on Form ILB/A (Revised) and must reach the Import Licensing Branch, 43, Marsham Street, London, S.W.1, not later than July 25, 1953. Page 1 of the form should be completed but on Page 2 only Question 4(a) need be filled in. On page 3 and following pages applicants should fill in only the Name and Full Postal Address, the Applicant's Reference Number and the Description of Goods. Applicants should *not* enter a value on Page 3.

The quota will be allocated on the basis of imports during either (a) the twelve months January 1 to December 31, 1952, or (b) the two years January 1, 1951, to December 31, 1952.

* * *

●At the invitation of the L.M.B.A., some 16 boys from Felsted School, with their Careers Master, Mr. R. Q. Drayson, D.F.C., M.A., visited a building site in Stockwell Road, Brixton, last week, where the Unit Construction Company is building 18 blocks of 5-storey flats for the L.C.C.

The boys were received by Mr. C. P. Morley, a director of the Company, and after a brief explanatory talk toured the site and the buildings for some two hours. Special features of interest in it are the tower crane, which enables materials to be hoisted to the men at work as the building grows, a mono-rail, which supplies materials to the men mechanically, and a central boiler, which will heat all the blocks of flats when they are completed.

Over tea, Mr. Laurence Holloway, Chairman of the L.M.B.A. Education Committee, who with the President, the Director and Mr. K. H. Bird, represented the L.M.B.A., gave a talk on the opportunities in the building industry for public schoolboys and answered questions. To public schoolboys who took the trouble to qualify, either through Universities or Technical Schools, the building industry offered considerable attractions.

The purpose of the visit, which was the eighth or ninth of its kind, is to interest public schoolboys in the attractions of the building industry as a career.

* * *

●British Insulated Callender's Cables, Ltd., announce that with effect from August 1, 1953, the address of their Exeter Branch Office will change to: 40, Whipton Village Road, Whipton, Exeter. Tel: Exeter 67308.

* * *

●Eastwoods, Limited, announced that Sir Gilbert Davis, Bart., A.M.I.Chem.E., and Mr. E. W. Yetton, A.C.I.S., have been co-opted to the Board.

Mr. E. W. Yetton vacates his position as Secretary and Assistant General Manager to the Company.

Mr. H. E. Severn, A.C.I.S., has been appointed Secretary and Mr. Kenneth Miller, A.R.I.C.S., Assistant General Manager.

CONTRACT • NEWS •

Notes below give basic data of contracts open under locality and authority which are in bold type. References indicate: (a) type of work, (b) address for application. Where no town is stated in the address it is the same as the locality given in the heading, (c) deposit, (d) last date for application, (e) last date and time for submission of tenders. Full details of contracts marked ★ are given in the advertisement section.

OPEN

BUILDING

BARNSTAPLE R.C. (a) 3 houses, Beechfield Estate, Fremington. (b) A. J. Dennis, The Red House, Castle Street. (c) 2gns. (e) Aug. 4.

• • •

BASINGSTOKE B.C. (a) 9 shops and maisonnettes with ancillary stores and garages, South Ham site. (b) Borough Architect, Municipal Buildings. (c) 2gns. (e) Aug. 4.

• • •

BATTLE R.C. (a) 1 pair of bungalows, Copland Rise Estate, Northam. (b) A. H. Neave, 38, Mount Street. (c) 2gns. (e) Aug. 12.

• • •

BEXLEY B.C. (a) Erection of first section of community centre at Falconwood Parade, Welling. (b) Borough Engineer, West Lodge, Broadway, Bexleyheath. (c) 2gns crossed cheque payable to Corporation. (e) Aug. 7.

• • •

BUCKS C.C. (a) Home for 10 children, Southcourt Estate, Aylesbury. (b) County Architect, County Offices, Walton Street, Aylesbury. (c) 2gns. (d) July 31. (e) Aug. 28.

• • •

CHEPSTOW R.C. (a) 5 pairs of houses with sewer and sewage disposal works, Mathern. (b) Messrs. Thomas and Morgan and Partners, 23, Gelliwastad Road, Pontypridd. (c) 3gns. (e) Aug. 4.

• • •

CHESTERFIELD R.C. (a) Block of 6 shops with 3 flats over, Birk Hill Estate, Eckington. (b) Engineer and Surveyor, Rural Council House, Saltergate. (c) 2gns. cheque. (e) Aug. 10.

• • •

DURHAM C.C. (a) 6 shops and 4 flats, Sunderland Road Estate. (b) City Engineer, Town Hall. (c) 2gns. (e) Aug. 31.

• • •

ELSTREE R.C. (a) Contract No. 68. 24 lock-up garages, Bullhead Road, Boreham Wood. (b) Engineer and Surveyor, Council Offices, Shenley Road, Boreham Wood. (c) 2gns. (e) Aug. 10.

• • •

ERPINGHAM R.C. (a) 1 pair of dwellings at Trimingham. (b) Architect and Surveyor, Council Offices, St. Peter's Road, Sheringham. (c) 2gns. (e) July 31.

• • •

GAINSBOROUGH U.C. (a) Part rebuildings, war damage reinstatement and modifications at the Town Hall. (b) Messrs. Fisher and Hollingsworth, 23, Lowgate, Hull. (c) 2gns crossed cheque payable to Council. (e) Aug. 11.

• • •

HYTHE B.C. (a) Public convenience at Red Lion Square. (b) Borough Surveyor, Municipal Offices. (c) 2gns. (e) Aug. 21.

• • •

IPSWICH B.C. (a) 11 shops and 10 dwellings in 2 blocks, Chantry Estate. (b) Borough Engineer, 19, Tower Street. (c) 3gns cheque. (d) July 28. (e) Aug. 27.

• • •

LANCASHIRE C.C. (a) 1 house and office at Windgate Lane, Tarleton; 1 house and office at Brook Lane, Hoole; 1 pair of houses at Durham Avenue, Cleveleys; for police. (b) County Architect, County Hall, Preston. (d) July 25.

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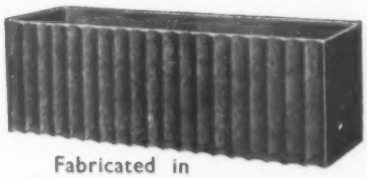
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LONDON—TOTTENHAM B.C. (a) 12 aged persons' dwellings and 12 maisonnettes, Arthur Road site. (b) Borough Engineer, Town Hall, N.15. (c) 2gns. (d) Aug. 7.

* * *

LOTHINGLAND R.C. (a) 10 dwellings, Norfolk Road, Wangford. (b) Council's Clerk, Council Offices, Rectory Road, Lowestoft. (c) 2gns. (d) July 30. (e) Aug. 21.

* * *

MAIDENHEAD B.C. (a) Contract 4C. 24 houses, Spencers Estate. (b) Borough Engineer, 14, Craufurd Rise. (c) £2 (e) Aug. 10.

* * *

MANCHESTER C.C. (a) 16 houses on 3 sites, Wythenshawe. (b) Director of Housing, Town Hall, 2. (c) 2gns. (e) Aug. 10.

* * *

MONMOUTH B.C. (a) (1) 3 houses at Rockfield Road. (2) 12 maisonnettes at Rockfield Road, playground site; and (3) 3 houses at Manson Heights, Manson Lane. (b) Borough Surveyor, Council Offices. (c) 2gns. (e) Aug. 15.

* * *

MONMOUTHSHIRE C.C. (a) 6 houses at Prioress Hill Institute of Agriculture, Usk. (b) County Architect, Queen's Hill, Newport. (c) 3gns cheque payable to Council. (e) Aug. 4.

* * *

N. IRELAND—BANBRIDGE AND DROMORE HOSPITAL MANAGEMENT COMMITTEE. (a) Adaptations and extensions to Gate Lodge, Cowan Heron Hospital, Dromore, Co. Down. (b) Messrs. Hobart and Heron, Scottish Provident Buildings, Belfast. (c) 2gns. (e) Aug. 3.

* * *

N. IRELAND—BELFAST. (a) Additions to wireless maintenance workshop at Lislea Drive. (b) Ministry of Finance, Room 103, Law Courts Buildings, May Street. (c) £2. (e) Aug. 6.

* * *

N. IRELAND—TYRONE. (a) 6 cottages at the Forestry Centre. (b) Ministry of Finance, Room 103, Law Courts Buildings, May Street. (c) £2. (e) July 31.

* * *

NORTON R.C. (a) 4 houses at Butterwick, near Malton. (b) Council's Architect, Council Offices, Welham Road, Norton, Malton. (c) 2gns. (e) Aug. 12.

* * *

ST. HELENS B.C. (a) (Contract No. 2024) 22 houses, Pocket Nook Estate, Merton Bank Section, St. Helens; (Contract No. 2025) 1 block of 2 houses, 2 flats and 2 shops, Cecil Street, Hoghton Road Section, St. Helens; (Contract No. 2033) 47 houses, Windlehurst Estate, Hard Lane Section, St. Helens. (b) Borough Engineer, Town Hall. (c) 2gns each contract. (e) Aug. 14.

* * *

SCOTLAND—BURGH OF BARRHEAD. (a) 29 houses, Aurs Burn site; 12 houses, Arthurlie Street; (separate trades). (b) Messrs. William Baillie and Son, 4, West Regent Street, Glasgow, C.2; stating trades and schemes.

* * *

SCOTLAND—WEST LOTHIAN C.C. (a) 50 houses at Whiteside, Bathgate; 55 houses at Bridgend, Linlithgow; 58 houses at Seafield; 16 houses at Redburn Road, Blackridge; 32 houses at Dalmeny; (separate trades). (b) County Clerk, County Buildings, Linlithgow, stating trades and schemes. (d) July 25.

* * *

STONE R.C. (a) 4 bungalows at Oulton. (b) Messrs. Hollins, Jones and Oldacre, Lloyds Bank Chambers, Newcastle, Staffs. (c) £2 cheque.

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STRETFORD B.C. (a) Public convenience at Third Avenue, Trafford Park. (b) Borough Engineer, Town Hall. (c) 2gns. (e) Aug. 1.

* * *

SUNDERLAND B.C. (a) 4 shops and flats and 6 garages, Hill View Estate. (b) Borough Architect, Grange House, Stockton Road. (c) 2gns. (e) Aug. 14.

* * *

SWINTON AND PENDLEBURY B.C. (a) 4 blocks of 8 flats, Clifton Estate. (b) Borough Engineer, Town Hall, Swinton. (c) 2gns. (e) Aug. 17.

* * *

THORNE R.C. (a) Public conveniences at The Green. (b) Council's Surveyor, Council Offices, Thorne, Doncaster. (e) Aug. 1.

PLACED

Notes on contracts placed state locality and authority in bold type (1) type of work, (2) site, (3) name of contractor and address, (4) amount of tender or estimate. † denotes that work may not start pending final acceptance, or obtaining of licence, or modification of tenders, etc.

LONDON COUNTY COUNCIL. (1) 155 flats and 54 maisonettes in 9 blocks. (2) Patmore Estate, Battersea. (3) Wilson Lovatt and Sons, Ltd., 16, Grosvenor Crescent, London, S.W.1. (4) £462,755. (1) 48 flats. (2) Clapham Park Estate. (3) Bunting Construction Co., Ltd., Acre Lane, London, S.W.2. (4) £108,080.

* * *

HULL. (1) Third phase of Queens House building, for Ravenseft Properties, Ltd., Charles Street, London, W.1. (3) F. G. Minter, Ltd., 4, Buckingham Gate, London, S.W.1. (4) £230,000.

* * *

WOOLWICH B.C. (1) 128 flats. (2) Borstall Wood Estate. (3) Direct Labour. (4) £2,10,028.

* * *

WANSTEAD AND WOODFORD B.C. (1) 56 flats and hall. (2) Broomhill Road. (3) Roy W. King (Builders), Ltd., Woodford Avenue, London, E.18. (4) £123,478.

* * *

SUNBURY-ON-THAMES U.D.C. (1) 80 houses. (2) Beechwood Avenue. (3) The Eden Residential Construction Co., Ltd., 1, Church Terrace, Richmond, Surrey. (4) £118,300.

* * *

UXBRIDGE U.D.C. (1) 122 dwellings. (2) Maygoods Farm Estate, Cowley. (3) E. J. G. Morgan, Ltd., Cowley Mill Road, Uxbridge. (4) £155,570.

* * *

ALDERSHOT B.C. (1) 132 flats in blocks. (2) Denmark Square. (3) T. Hodgson (Builders), Ltd., York Crescent, Aldershot. (4) £187,500.

* * *

ROMFORD, ESSEX. (1) Factory. (2) Harold Hill Industrial Estate, for M. Cooper, Ltd. (3) A. E. Symes, Ltd., 1a, Carpenters Road, London, E.15. (4) Cost £50,000.

* * *

WATFORD. (1) Factory buildings for Scammell Lorries, Ltd. (3) C. Brightman and Son, Ltd., Ebury Road Works, Watford. (4) Cost £50,000.

* * *

LONDON, N.W.11. (1) Medical institute. (2) Manor House Hospital, North End Road. (3) W. F. Blay, Ltd., 6a, Spital Street, Dartford, Kent.

* * *

MITCHAM B.C. (1) 36 maisonnettes. (2) Baron House Estate. (3) E. H. Smith (Croydon), Ltd., 48, Wellesley Road, Croydon. (4) £82,859.

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* * *

BEXHILL. (1) Transmitting (TV) Station for B.B.C. (2) O. Marx, 155, Sandgate Road, Folkestone.

* * *

WEST HARTLEPOOL B.C. (1) 60 flats. (2) Lambton, etc., streets. (3) C. M. Yuill, Ltd., Villiers Street, West Hartlepool.

* * *

SMETHWICK B.C. (1) 34 houses. (2) Gt. Arthur Street. (3) Direct Labour. (4) £46,639.

* * *

NEWCASTLE-UNDER-LYME B.C. (1) Houses and dwellings. (2) Various sites. (3) Madew and Wardle, Ltd., Market Lane, Newcastle, Staffs, £183,431. A. Jones (Builders), Ltd., London Road, Chesterton, Staffs, £63,526. J. Jones, Ltd., Liverpool Road, Newcastle, Staffs, £57,449. Other contracts: (1) 32 houses, 12 maisonnettes. (2) Hollows Farm. (3) G. and J. Seddon, Ltd., Duke Street, Fenton, Staffs. (1) 60 houses, 8 maisonnettes. (3) Cornes (Construction), Ltd., Station Road, Tunstall, Stoke-on-Trent.

* * *

DURHAM CITY COUNCIL. (1) 54 houses. (2) Sunderland Road. (3) Veti and Edwards, Ltd., Thornley, Co. Durham.

* * *

SUNDERLAND T.C. (1) 198 houses. (2) Castletown. (3) L. W. Evans, Ltd., Norfolk Street, Sunderland.

* * *

WEST LANCASHIRE R.D.C. (1) 32 houses, 8 flats. (2) Halsall, near Ormskirk. (3) Frank Gatley, Ltd., Lydiate, Lancs. (4) £59,110.

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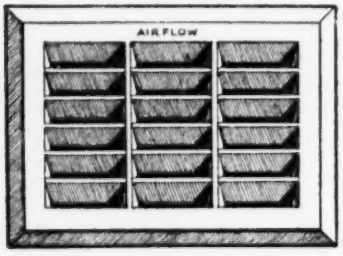

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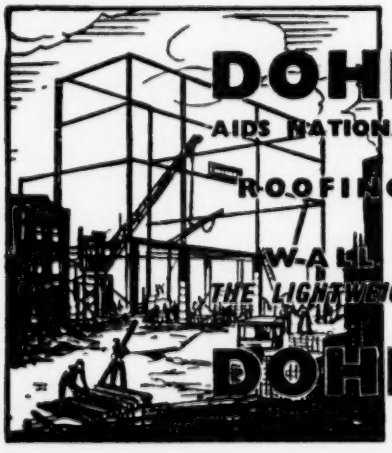

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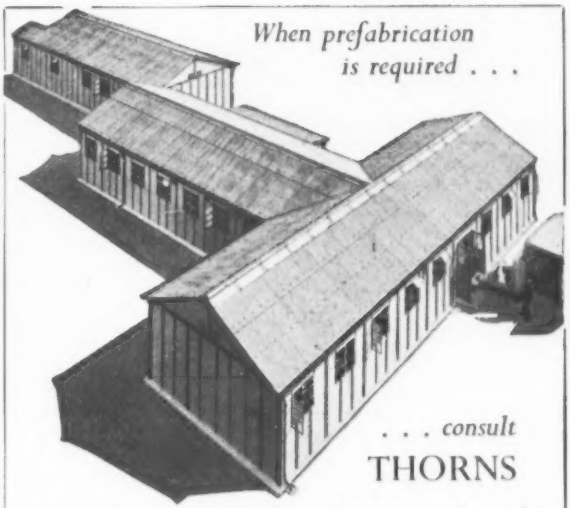

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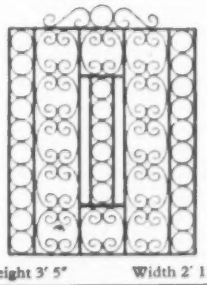

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For the issue of "The Architect and Building News" dated August 6th, classified advertisements must reach us by 1ST POST, FRIDAY, JULY 31st.

APPOINTMENTS

The engagement of persons answering these advertisements must be made through the local office of the Ministry of Labour and National Service, etc., if the applicant is a man aged 18-64 or a woman aged 18-59 inclusive, unless he or she or the employer is excepted from the provisions of The Notification of Vacancies Order 1952.

MINISTRY OF WORKS.

VACANCIES exist in the Chief Architect's Division for ARCHITECTURAL ASSISTANTS with recognized training and fair experience. Vacancies mainly in London and Risley (nr. Warrington). Successful candidates will be employed on a wide variety of Public Buildings including Atomic Energy and other Research Establishments, Telephone Exchanges and Housing.

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Write stating age, nationality and full details of training and experience, to Chief Architect, W. G. 10/C.A.2, Ministry of Works, Abell House, John Islip Street, London, S.W.1. [7077

EXMOUTH URBAN DISTRICT COUNCIL.

APPOINTMENT OF QUANTITY SURVEYING ASSISTANT (CAPITAL WORKS)

APPLICATIONS are invited for the permanent appointment of QUANTITY SURVEYING ASSISTANT in the Engineer and Surveyor's Department at a salary in accordance with A.P.T. Grade V (£595-£645) of the National Scale of Salaries. The appointment will be subject to the National Scheme of Conditions of Service, the provisions of the Local Government Superannuation Act, 1937, and will be terminable by one month's notice on either side. The selected candidate will be required to pass a medical examination.

Applicants must be Associate Members of the Royal Institution of Chartered Surveyors (Quantity Section) or hold equivalent qualifications, and have experience in the preparation of Bills of Quantities, Interim Certificates and the settlement of final accounts.

The Council will provide housing accommodation if required.

Applications endorsed "Quantity Surveying Assistant" stating age, qualifications, experience, present and previous appointments held together with copies of three recent testimonials must be received by the undersigned not later than 31st July, 1953.

Applicants must state whether to their knowledge they are related to any member or the holder of any office under the Council.

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Clerk and Solicitor.

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Exmouth. [7216

LANCASHIRE COUNTY COUNCIL.

PLANNING DEPARTMENT.

PLANNING ASSISTANT (ARCHITECTURAL), £465-£645, required at Preston. Candidates should be studying for, or possess, an architectural qualification. Salary, within Grades I-V, will be according to qualifications and experience.

Applications, giving experience, qualifications, present salary and two referees, to County Planning Officer, East Cliff County Offices, Preston, by 5th August, 1953. [7221

LONDON COUNTY COUNCIL.

ARCHITECT'S DEPARTMENT.

VACANCIES for ARCHITECTS (A.R.I.B.A.), up to £696, in Housing Schools and General Divisions.

Particulars and application forms, returnable by 31st July, from Architect (AR/EK/A/3), County Hall, S.E.1. (741.) [7212

APPOINTMENTS—contd.

BOROUGH OF OLDBURY.

APPOINTMENT OF ARCHITECTURAL ASSISTANTS.

APPLICATIONS are invited for the undermentioned appointments in the Architect's Section of the Borough Surveyor's Department:—

(a) ASSISTANT ARCHITECT, Grade A.P.T. V(a)—(Housing).

(b) ASSISTANT ARCHITECT, Grade A.P.T. V(a)—(Education).

Applicants for the above appointments should be qualified members of the R.I.B.A. and preferably having previous experience with a local authority. Candidates for (a) should be experienced in the layout of contemporary housing schemes, the design and construction of municipal houses, flats and shopping centres and capable of administering building contracts.

For appointment (b) candidates should be qualified to take charge of the maintenance of education and public buildings, including the preparation of estimates, working drawings and specifications and administration of building contracts.

The appointments will be subject (a) to the conditions of the National Joint Council for Local Authorities Administrative, Professional, Technical and Clerical Service, (b) to the Local Government Superannuation Act, 1937, and (c) to the successful candidate passing a medical examination.

Applications giving particulars of age, experience, etc., together with the names of two referees, should be addressed to the undersigned not later than Saturday, 8th August, 1953.

Housing accommodation will be made available to married applicants if required.

KENNETH PEARCE,
Town Clerk.

Municipal Buildings,
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(SECOND ADVERTISEMENT.)

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Forms of application may be obtained from the Principal, College of Art and Crafts, Margaret Street, Birmingham, 3, on receipt of a stamped addressed foolscap envelope and must be returned not later than ten days after the appearance of this advertisement.

Persons who replied to the first advertisement in May should not submit a second application. If they desire their original application to be brought forward, they should send a written request to that effect to me at the College of Art and Crafts.

E. L. RUSSELL,
Chief Education Officer.
[7224

BOROUGH OF BRENTFORD AND CHISWICK.

APPOINTMENT OF ARCHITECTURAL ASSISTANT.

APPLICATIONS are invited for this appointment in the Borough Engineer and Surveyor's Department at a salary according to Grade VI of the A.P.T. Division of the National Scheme (£670-£735 p.a. plus London weighting) commencing 1st year. Forms (containing further particulars and conditions) obtainable from the undersigned, by whom applications must be received not later than the 7th August, 1953.

W. F. J. CHURCH,
Town Clerk.

Town Hall,
Chiswick, W.4.
16th July, 1953. [7232

CONTRACTS

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MEIRION O. JONES,
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ILFORD Ltd. require architectural assistants with at least two years' office experience; minimum standard R.I.B.A., Intermediate; five-day working week with pension scheme and staff canteen in operation.—Applications in writing, giving age, training and experience, to Chief Staff Architect, Ilford Ltd., Romford, Essex. [7218

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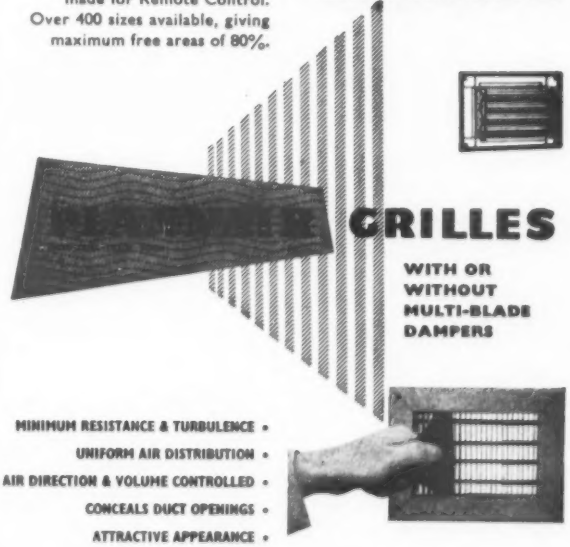

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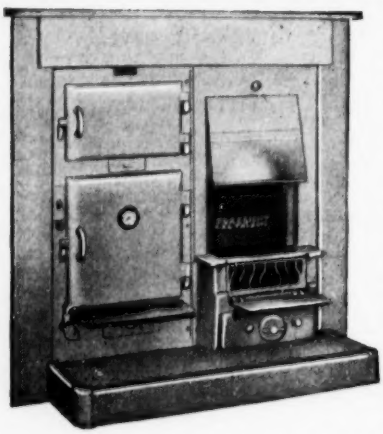

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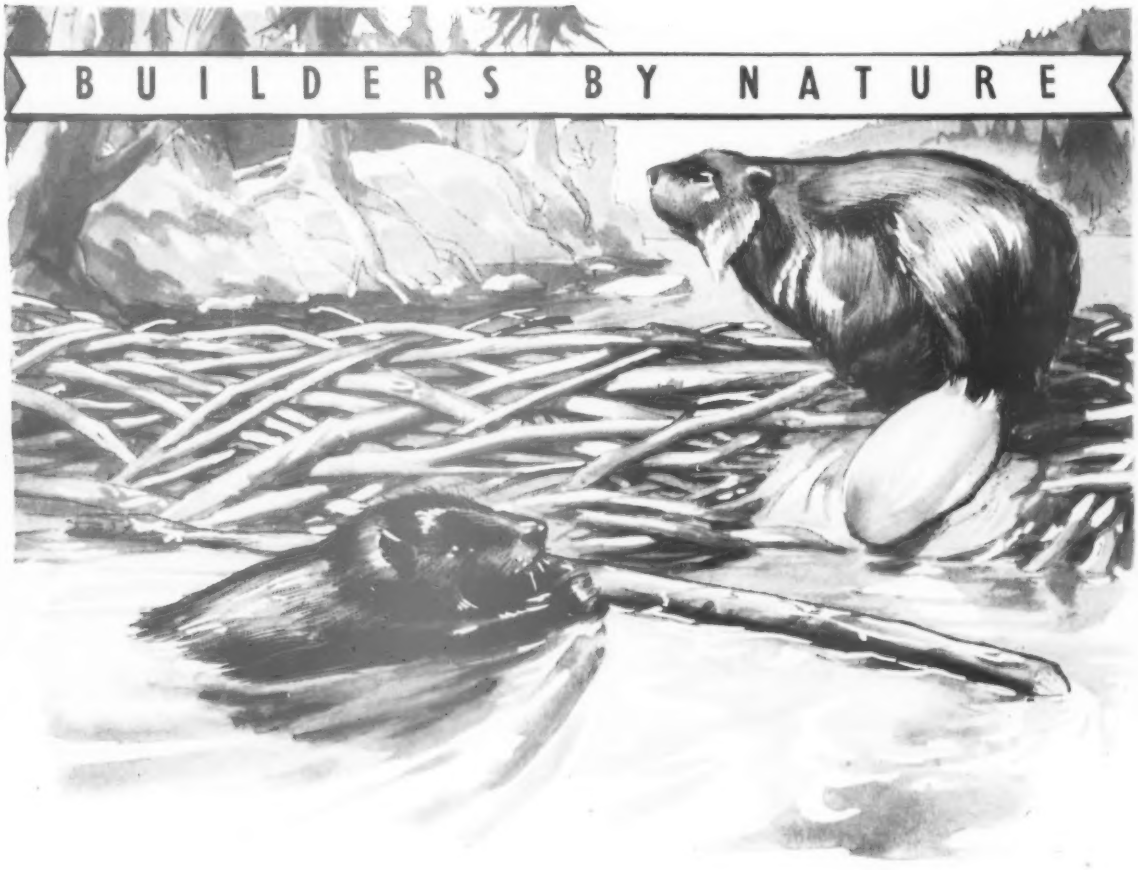

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